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The Color of Industry: Frank Stella, Donald Judd, and Andy Warhol

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The Color of Industry: Frank Stella, Donald Judd, and Andy Warhol
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CHAPTER 1

INTRODUCTION

“All I want anyone to get out of my painting, and all I ever get out of them, is the fact that you can see the whole idea without any confusion... What you see is what you see.” —Frank Stella, “Questions to Stella and Judd,” interview by Bruce Glaser and edited by Lucy R. Lippard, ArtNews 65 (September 1966): 55-61.

“I wanted work that didn’t involve incredible assumptions about everything...I didn’t want work that was general or universal in the usual sense. I didn’t want it to claim too much...” —Donald Judd, Statement, Dictionary of Contemporary Artists (1977), in Complete Writings: 1975-1986, Donald Judd (Eindhoven, Netherlands: Van Abbemuseum, 1987), 7.

“If you want to know all about Andy Warhol, just look at the surface of my paintings and films and me, and there I am. There’s nothing behind it.” —Andy Warhol, “Andy: My True Story,” interview by Gretchen Berg, Los Angeles Free Press, 17 March 1967, 3.

Upon first examination, American artists in the 1960s seemed to deny meaning in their art, reducing their work to non-art objects through the use of cold, industrial metals and commercial paints. Yet the story of Minimalism and Pop art, which flourished during the same years in the early sixties, does not concern a simplistic denial of meaning, but rather a *displacement* of meaning. Looked at from the historical standpoint of post-Abstract Expressionism, the art of Frank Stella, Donald Judd, and Andy Warhol attempted to remove the awesome and emotional context of their painterly forefathers. An important distinction, however, is that the artist statements do not deny meaning but transfer meaning to the *surface*. Stella’s tautology “what you see is what you see” emphasizes the image alone, negating the

presence of both illusion and allusion within the work. This statement and others prompted art historians to consider the formal aspect of the shaped canvas and the material component of commercial paint as the primary constructs of Stella's two early series, notably the *Black Paintings* of 1958-60 and the *Aluminum Paintings* of 1960. The "whole idea without any confusion" eliminates a need for further inquiry and disregards additional knowledge that might cloud a straightforward interpretation. Like Stella, Judd indicates that the work purposefully lacks context. "Incredible assumptions" would attach unwanted meaning. Additionally, if the preceding generation of Abstract Expressionists produced work that claimed emotional depth, then Judd wanted to do the opposite. Finally, Warhol instructs viewers to examine the surface only and articulates the displacement, not denial, of meaning.

Frank Stella, Donald Judd, and Andy Warhol are three artists who were spokesmen for limited meaning; yet the silvery, reflective surfaces of their industrial mediums invite more complex interpretations. The artists' aversion to art of emotional depth must be seen as a trend in the sixties in conjunction with a desire to oppose the rhetoric of the Abstract Expressionists. Moreover, the use of industrial materials should be seen as the crucial extension of this philosophical trend. It is the objective of this paper to construct a vision of how these industrial mediums served to remove the artist's hand and defer meaning but also how they fall short of such lofty goals, displacing meaning beyond the surface depending on titles, physical environments, and associations of metal. After critical analysis of the works, the metallic surfaces reveal illusion through color and allusion to themes of speed, mechanical reproduction, and narcissism.

This paper will discuss Stella, Judd, and Warhol with respect to their individual uses of industrial materials, their attempted denial of the artist's hand, the tension between repellency and reflection, and the important presence of specific external references. None of these discussions are definitive, as proven by the extensive critical research of art historians in the past half-century. Ultimately, it is the displacement of meaning enacted through the creation of Stella's repetitive, blank pictorial picture plane, Judd's smooth metal surfaces, or Warhol's blank canvases and silver surfaces that actually demands human participation from viewers, making the experience of sight and space part of the meaning of the work. Although the Minimalist work of Stella and Judd and the Pop Art work of Warhol rejected the painterliness of Abstract Expressionism, the blankness of the 1960s canvas and sculpture ultimately harks back to certain Abstract Expressionist Color Field paintings in that it explores the effects of form and color on the experience of viewers. Yet whereas the Abstract Expressionist intention was to express the artist's unconscious, the industrial color fields of the sixties offer access to an all-over field that has an illusive quality. In this way, the industrial metals are not cold, empty manifestations of mechanical reproduction, but as luminous mirrors to the outside world and as a reflection of a physical collective experience.

As mentioned above, the rhetoric of the sixties must be partially defined against the rhetoric of the Abstract Expressionists, who worked predominantly in the post World War II period of the 1940s and 1950s. According to Clement Greenberg's important essay "After Abstract Expressionism," published in 1962 in *Art International*, the abstract movement "means painterliness: loose, rapid handling, or

the look of it; masses that blotted and fused instead of shapes that stayed distinct; large and conspicuous rhythms; broken colour; uneven saturations or densities of paint, exhibited brush, knife, or finger marks...”¹ From the late 1940s onwards, Abstract Expressionism asked viewers to trace movement on the canvas and to seek out variations in the surfaces. Mark Rothko, Clyfford Still, Barnett Newman, Jackson Pollock, Willem de Kooning and others created a junction between aesthetics and psychology and were often aware of an individualizing effect of the painted fields. In the words of David Anfam in “Interrupted Stories: Reflections on Abstract Expressionism and Narrative,”

...the rhetorical language and artistic ruses during the aforesaid period target a single aim: an uninterrupted relation between the beholder and the work. Absorption will be total, unified and directly effected...Such a goal may explain aspects as otherwise diverse as the metaphors of active vision, the totalising narrative of the ‘sublime’, the advent of large open fields of saturated colour which are meant to convey a noumenal weight...The appropriate map for the Abstract Expressionist ideal at this stage would surely be the human body itself, with its implicit sentence, presence and indivisibility.²

The artist’s inner emotions and perhaps even tormented mentality during post-war America were addressed to individuals who would bring the very “incredible assumptions” about deep metaphorical meaning that Judd later chose to reject. The effect of illusionistic abstraction created a relationship between the viewer and the canvas that not only reflected the soul of the artist, but also encouraged personal

¹ Clement Greenberg, “After Abstract Expressionism,” Art International 6, no. 8 (October 1962): 24.

² David Anfam, “Interrupted Stories: Reflections on Abstract Expressionism and Narrative,” in American Abstract Expressionism (Liverpool: Liverpool University Press, 1993), 27-29.

reflection. Due to the psychological torment created by the war, this immediate post-war generation seems to have felt a need to assign grand meaning onto their art.

A case in point of an Abstract Expressionist painting's individualizing effect upon the viewer is Barnett Newman's *Vir Heroicus Sublimus* (1950-1951) from The Museum of Modern Art in New York (Fig. 1). Literally meaning, "Man, Heroic and Sublime," the metaphorical title refers to aspirations for spirituality and transcendence.³ Because Newman intended viewers to stand close to the painting, the nearly eight by eighteen feet red expanse of paint engulfs their individual environment. Only the four vertical stripes, or "zips," as Newman called them, break the monochromatic field. Yet the vast, primary red canvas also unifies the entire surface, creating a terrifying and exhilarating void as metaphor for the expanses of sublime nature. In his 1948 essay "The Sublime is Now," Newman wrote,

We are reasserting man's natural desire for the exalted, for a concern with our relationship to the absolute emotions...The image we produce is the self-evident one of revelation, real and concrete, that can be understood by anyone who will look at it without the nostalgic glasses of history.⁴

Newman hoped that universal emotions would be instantaneously accessible in his work. In order to grasp the Sublime, a viewer required no prior knowledge about art history—the viewing practice itself was a bodily experience that would ignite deep, emotional, and spiritual metaphors.

³ Harriet Schoenholz Bee and Cassandra Heliczer, eds., with an introduction by Glenn Lowry, "Barnett Newman: *Vir Heroicus Sublimus*," in MoMA Highlights: 350 Works from The Museum of Modern Art New York, 2nd ed. (New York: The Museum of Modern Art, 2005), 195.

⁴ Barnett Newman, "The Sublime is Now," Tiger's Eye 1, no.6 (December 1948): 51-53.

The emotional undertones of Abstract Expressionist painting were further explicated by various modern art historians, such as Robert Rosenblum in “The Abstract Sublime” of 1961. The idea of the Sublime, Rosenblum argues, appeared in the eighteenth and nineteenth centuries as a Romantic expression:

...awe, terror, boundlessness, and divinity...began to rupture the decorous confines of earlier aesthetic systems. As imprecise and irrational as the feelings it tried to name, the Sublime could be extended to art as well as to nature. One of its major expressions, in fact, was the painting of sublime landscapes.⁵

Rosenblum argued that the energy and emotion that existed in turbulent J.M.W. Turner seascapes, for example, was then abstracted and enlarged onto the Abstract Expressionist canvas. The size of the Abstract Expressionist work also helped produced the Sublime, as large all-over fields command powerful presence in gallery spaces by dwarfing viewers.

In 1953, a startling artistic statement announced how a new generation of artists would reconsider the rhetorical language and distinct marks of Abstract Expressionism. Robert Rauschenberg, an American Neo-Dada artist, created *Erased De Kooning Drawing* (Fig. 2) by slowly erasing the marks of a Willem De Kooning drawing in order to create an entirely new work of art. De Kooning’s recognizable Abstract Expressionist style reduced to the blank off-white paper can be considered a symbolic statement— an erasure of the past. If these marks represented the inner man, then De Kooning’s meaningful personality could no longer be attached to the

⁵ Robert Rosenblum, “The Abstract Sublime,” *ArtNews*, February 1961, in *On Modern American Art*, ed. Robert Rosenblum (New York: Harry N. Abrams, 1999). 72.

work. Although Rauschenberg claimed the work was a “celebration, not a negation”⁶ of that mode of thinking, the erasure represents a younger generation’s temptation to challenge ideas. Although the word “minimal” did not enter into the art world’s vocabulary until after the April 1966 opening of “Primary Structures: Younger American and British Sculpture” at The Jewish Museum in New York, Rauschenberg’s experiment worked in the same vein as the Minimalist artists who would emerge in New York in the 1960s.

At the onset of the 1960s, the individualizing relationship with the Abstract Expressionist work would be challenged by a younger generation experimenting with new Minimalist work, metallic mediums, and fabrication methods. Now further removed from the War, artists no longer needed to provoke feeling and reflect the soul; they wanted to break with art historical continuity by creating something utterly new. The economic booms of the 1950s and 1960s following World War II welcomed the growth of industrialism and mechanical reproduction of commodities. Consumerism exploded, and access to new materials and commercial paints was widespread. It was the perfect time for American artists to think beyond the realm of traditional mediums.

Commercial aluminum paint offered an outlet for experimentation, particularly for Jackson Pollock, who was one of the first post-war artists to take advantage of commercial metallic paint. Yet it must be clarified that Pollock was an

⁶ Robert Rauschenberg, “Video: Rauschenberg on Erased De Kooning,” produced by San Francisco Museum of Modern Art, video, “SFMOMA: Robert Rauschenberg: Erased De Kooning Drawing,” Artists/Artists in Context: Making Sense of Modern Art, San Francisco Museum of Modern Art. 20 January 2007, <<http://www.sfmoma.org/msoma/artworks/93.html>>.

Abstract Expressionist, and a member of Rosenblum's Abstract Sublime group, who in no way tried to prevent the presence of meaning as Stella, Judd, and Warhol would. In *Machine in the Studio*, Caroline Jones writes, "In Pollock's hand the metallic paint became a soft gray, with occasional shimmering highlights that only added to his paintings' atmospheric qualities."⁷ Pollock's *Lavender Mist* (1950) (Fig. 3), for example, weaves silver through other colors, displaying layers of paint that the viewer can imaginatively enter. The atmospheric qualities that Jones mentions suggest a gaseous space created by the mixture of oil and the cheap aluminum shimmer. Pollock used an unprimed canvas, causing the cloth to soak up the paint, rather than reflect it such as would have occurred on a primed canvas or an unabsorbent metal surface. Pollock's random, interlocking drips coupled with his desire to be 'in' his paintings prevented the mirror-like flat field of reflective color, such as that produced by a Warhol silkscreen.⁸ In this way, Pollock's sporadic use of commercial aluminum paint can be seen as a precursor for the surge in popularity of industrial materials during Minimalism and some Pop art.

Although Stella, Judd, and Warhol all deliver varied arguments as to why they used industrial materials in their art, their writings and statements about the displacement of meaning must be seen as the direct corollary for the use of industrial materials. James Meyer writes in *Minimalism: Art and Polemics in the Sixties*, "Because it resisted interpretation, because it seemed to claim that it meant nothing at

⁷ Caroline Jones, *Machine in the Studio: Constructing the Postwar American Artist* (Chicago: University of Chicago Press, 1996), 211.

⁸ Ibid.

all – nothing apart from the materials that comprised it and their simple organization – minimal work vexed those viewers who demanded more from the work of art: more content, more ‘complexity,’ more clues of the artist’s presence.”⁹ The materials such as aluminum, iron, steel, plastic, Plexiglas, copper and others could portray the idea of cold, non-referential, and mechanically fabricated art, but now must be seen as objects full of contradictions and complexity. The surfaces, illusionistic and reflective, and the connotations of color, particularly of silver and other metals, oppose the straightforward denial of meaning and ultimately produce myriad interpretations and allusions.

⁹ James Meyer, Minimalism: Art and Polemics in the Sixties (New Haven: Yale University Press, 2001), 6.

CHAPTER 2

FRANK STELLA: THE METALLIC GALLERY

When the Leo Castelli Gallery first introduced Frank Stella's *Black Paintings* of 1958-1960 in a group exhibition of 1959,¹⁰ a skeptical public mistook the artist's work as uncomplicated. Later that year, when The Museum of Modern Art included Stella's work in "Sixteen Americans" (16 December 1959 – 17 February 1960), the art world was still accustomed to the emotional depths and sensuous gestures of Abstract Expressionism. In contrast to Stella's *Black Paintings*, the *Targets*, *Flags*, and *Numbers* by Jasper Johns, also chosen for the exhibition, used recognizable symbols that audiences found more accessible. In addition, Johns' built-up, waxy surface made of encaustic and paint seemed reminiscent of the gestures of Abstract Expressionism more so than Stella's thinly painted stripes. For many, Stella's paintings seemed simple-minded, developed from a repertoire of geometric pattern. According to Robert Rosenblum, Stella's four canvases¹¹ in the exhibition looked devoid of emotion and "insolently static"¹² because of their repetitive stripes and near

¹⁰ "Opening of the New Gallery," Leo Castelli Gallery, (6 October – 17 October 1959).

¹¹ The four works by Frank Stella in "Sixteen Americans" at The Museum of Modern Art were *Arundel Castle*, *Die Fahne Hoch!*, *The Marriage of Reason and Squalor* (Second Version), and *Tomlinson Court Park* (Second Version).

¹² Robert Rosenblum, Frank Stella (City: Pub, year), 16.

monochromy. Of the relationship between the *Black Paintings* and Abstract Expressionism, Rosenblum writes: Stella's work "appeared to empty that tradition of its emotional fervor and visual complexity...Stella's paint application moved toward an almost impersonal regularity and evenness..."¹³ Rosenblum's remarks express how the initial critical confrontation with the work was contempt for its seeming simplicity and impersonality.

Because of a tendency to compare new work to Abstract Expressionism, Stella's early work was analyzed by what *is not* present, rather than what *is* present.¹⁴ Gone were the emotional fervor of Pollock's action painting and the bodily experience of Newman's heroic, mural-sized canvases. Furthermore, Stella only encouraged literal readings, as epitomized by his famous remark, "what you see is what you see," and as exemplified by an early lecture he gave at Pratt University in 1960. In this lecture he proclaimed that he wanted to take the "illusionistic space out of the painting at a constant rate by using a regulated pattern."¹⁵ Such geometric repetition served to negate the presence of gesture that was central to the Abstract Expressionist composition, for instance in Pollock's all-over drip. Caroline Jones writes, "The Abstract Expressionists still want to draw with paint, whereas Stella and those for whom he attempts to speak merely transfer the paint from container to

¹³ Ibid., 16-17.

¹⁴ Lawrence Rubin, Frank Stella Paintings: 1958 to 1965 (New York: Stewart Tabori & Chang, Publishers, 1986), 10

¹⁵ Frank Stella, *Untitled Lecture and Sketches*, presented to art students at the Pratt Institute (January or February 1960), in Richardson, 78.

surface, with as minimal interference as possible.”¹⁶ Stella’s transfer of paint was a house-painter technique, in which the width of the brush determines the width of the stripes. Repetitive and lacking in gesture, the vertical housepainter gesture coupled with the monochromatic black canvas demonstrated a new concept, which was of great interest to a new generation. The artistic movement that came to be known as Minimalism, signified art that was stripped-down to its elemental, geometric form, devoid of the personal and emotional elements of prior artistic movements.

Despite Stella’s insistence otherwise, the *Black Paintings* were not without meaning. The series did more than develop a mechanical system of paint application; importantly, as a precursor to the *Aluminum Paintings* of 1960, the *Black Paintings* informed viewers of how to comprehend Stella’s use of titles, brushstroke, shape, and scale in his later industrial works. In total, Stella produced twenty-four *Black* paintings, each with a distinct and meaningful title. Paradoxically, the color field Abstract Expressionist Mark Rothko recycled titles of variations on color groupings such as “Red, Orange, and Blue” or simply left his works “Untitled,” whereas Stella’s Minimal works, supposedly devoid of meaning, conjured up sorrowful or magical images due to mysterious titles.¹⁷ The mere presence of such mystifying titles completely contradicts Stella’s own statements that “what you see is what you see.” In *Frank Stella: The Black Paintings*, Brenda Richardson argues that the titles should even be seen as the reflection of “the painter who made them at the time he made

¹⁶ Jones, 124.

¹⁷ William Rubin described how he was “almost mesmerized by their eerie, magical presence” in William Rubin, “Younger American Painters,” Art International 4, no. 1, (January 1960): 24.

them... the psycho-sociology of Frank Stella of the late fifties and early sixties.”¹⁸ Titles that refer to places, such as dark, shadowy nightclubs, tenement housing, or minority neighborhoods, reflect the personal sociology of Stella’s life. Richardson’s psychoanalytic approach to Stella’s work is credible for ambiguous titles, such as *Arundel Castle*, that refers to the pompous name of a tenement house in a Brooklyn slum where Stella worked as a housepainter. However, it should be emphasized that some allusions are recognizable—even infamous—and would have invoked feeling in viewers as well. Although Richardson claims “Stella’s titles are (or should be) peripheral to the experience of painting as form,”¹⁹ such recognizable titles, as they inform one’s knowledge about the painting, become integral to the experience. Death and suicide, Nazi propaganda phrases, major disasters, or notable African-American and blind jazz musicians are the signified references that appeal to a larger audience. Anna Chave insists the artist’s suggestive titles and “minimalism generally, might well be described as perpetrating a kind of cultural terrorism, forcing viewers into the role of victim, a role that may or may not bring with it a moment of revelation depending on the viewer’s prior experience with victimization.”²⁰ Confronted with global tragedies, such as the effect of the Third Reich in Nazi Germany, viewers interpret allusions in Minimalism on the basis of their own socio-political climates and life experiences.

¹⁸ Brenda Richardson, Frank Stella: The Black Paintings (Baltimore: The Baltimore Museum of Art, 1976), 3.

¹⁹ Ibid.

²⁰ Anna Chave, “Minimalism and the Rhetoric of Power” Arts Magazine 64, no. 5 (January 1990): 49.

Consider *Die Fahne Hoch!*, a Black Painting completed in November 1959 (Fig. 4). The reference is too specific to be a part of Stella's *personal* psychosociology. Rather, the specific Nazi reference appeals to a collective, global psychology. The German phrase, meaning "The Flag on High!," is the first line from *Horst Wessel Lied*, the official marching song of the Nazi party. Not only does the vertical format of the painting correlate to a vertical flag, but the black color has associations with the "black history" of the Third Reich and the Holocaust, the "Blackshirts" of fascist parties, and the literal death of the lyricist Horst Wessel at the age of twenty-three.²¹ Even if a viewer was unaware of the exact translation or Wessel's death, the German exclamatory phrase in the context of other dark histories suggests its Nazi roots. Additionally, Stella evoked Nazi references in both *Reichstag* and *Arbeit Macht Frei*, the latter meaning "Work brings freedom," an ironic phrase that was hung at the entrance gates to a number of extermination camps. Even as he refined the character of the *Black Paintings*, establishing the desired stretcher dimensions and paintbrush width, Stella was deeply aware of the human sorrow he might awaken through such allusions. In his notes for the 1960 Pratt Lecture, he scribbled "the final solution" next to a drawing of *Arbeit Macht Frei*, the first of the *Black Paintings* to assume the ultimate character of the series. The mention of "the final solution" is a poignantly sorrowful double entendre, signifying Stella's design conclusions and also Adolf Hitler's plan of the same name to execute systematic genocide of the European Jewish population during World War II.²² In her recently

²¹ Richardson, 39.

published essay “Frank Stella is a Constructivist,” Maria Gough examines the small sketches and notes from the Pratt Lecture, ultimately ignoring the Nazi significance of “the final solution.” Gough points out the changing character of Stella’s designs and the solution Stella conceived for the problem of relational painting— that of a square field divided into four quadrants in order to create the “balancing of the various parts of the painting with and against each other...”²³ Even when paired with *Arbeit Macht Frei*, “the final solution” for Gough signifies nothing beyond its painterly solution.²⁴ The juxtaposition of Stella’s scribble next to a Nazi title cannot be ignored and indicates that the artist underscored metaphorical meaning. Although the titles are somewhat obscure, Stella must have been aware that he would raise issues from the collective vaults of memory concerning the Holocaust.

Other characteristics of the *Black Paintings* foresee the *Aluminum* series, particularly Stella’s considerations of brushwork and scale. To the public eye the *Black Paintings* initially seemed to lack human contact. Yet it didn’t take long for critics to distinguish a mechanically reproduced line from the “subtly vibrant edges”²⁵ of the stripes. The stripes were not always painted evenly, and can even be compared to the zips in a Barnett Newman composition. Newman’s zips, such as in *Vir*

²² The “final solution to the Jewish question” was actually conceived by Reinhard Heydrich, an SS commando and chief of the Reich Security Main Office, and was proposed to Adolf Hitler and other Nazi officials at the Wannsee Conference on January 20, 1942.

²³ Stella, *Untitled Lecture and Sketches at Pratt*, in Richardson, 78.

²⁴ Maria Gough, “Frank Stella is a Constructivist,” *October* 119 (Winter 2007): 103.

²⁵ Rosenblum, *Frank Stella*, 18.

Heroicus Sublimus, are mostly patchy and reveal red paint through the uneven strokes of the brush, evidencing the artist's touch. Like the zips, the black stripes expose blurred edges, and the absence of guided lines demonstrates Stella's desire to maintain a painterly element. Finally, because the scale of the works was close to mural size, Stella created continuity between Abstract Expressionism and the new Minimalism.

The production of the *Aluminum Paintings* of 1960 (Fig. 5) brought an onslaught of critical debate concerning the meaning of the Stella's works and the important role of industrial materials in Minimalist art. The artist's initial confrontation with metallic paints came in 1958 when he first arrived in New York and discovered sample cards from commercial paint dealers. Although he "didn't know what to do with them"²⁶ at the time, the industrial medium would serve to create an "increasingly anonymous"²⁷ work that could deny "references to anything beyond their own palpable physical reality."²⁸ Additionally Stella discovered that the surface repellency of the medium offered a profound addition to his "quasi-industrial," "nonartistic"²⁹ painting technique. The new series was capable of restricting allusion to unavoidable themes of industrialism and consumer culture as a

²⁶ Stella in William Rubin, Frank Stella, (New York: The Museum of Modern Art, 1970), 60.

²⁷ Barbara Haskell, BLAM! The Explosion of Pop, Minimalism, and Performance 1958-1964, (New York: Whitney Museum of American Art in association with W.W. Norton & Company, 1984), 91.

²⁸ Rubin, Frank Stella, 44.

²⁹ Jones, 119.

result of the metallic medium. Yet Stella's penchant for symbolism illustrated through the titles of the *Black Paintings* carried through to the *Aluminum* series. Whereas Richardson claims the titles were reflections of Stella's soul, Barbara Haskell, author of *BLAM! The Explosion of Pop, Minimalism, and Performance 1958-1964*, asserts the opposite. Haskell writes: "Stella's paintings were not records of inner psychological states, no special knowledge was required to decipher them; because their meaning lay in the material surface of the painting, it was theoretically available to everyone."³⁰ Yet the *Aluminum* series was an assertion of Stella's identity via the specific references of its titles. Additionally, despite subtle surface illusionism, the metallic paint emphasized a physical collective space; by inhibiting penetration of the surface, the series emphasized shared space, not individualizing space within the depths of the canvas.

The *Aluminum Paintings* comprise a total of twelve canvases, three of which have multiple versions due to repainted alterations. Stella first painted *Kingsbury Run*, *Luis Miguel Dominguin*, and *Marquis de Portago* in darker aluminum paint, then redid them in a lighter paint along with the rest of the series. Whereas the *Black* series comprise a total of twenty-four paintings in varying shapes until Stella established "the final solution," the revisions in the *Aluminum Paintings* belie a mechanical reproduction of form. The *Aluminum Paintings* are also more mechanical in application of the stripes. If Stella exhibited blurred edges where the white of the canvas poked through in the *Black Paintings*, in the *Aluminum Paintings* he carefully penciled in guidelines to create sharp edges. The pencil guidelines had the effect of

³⁰ Haskell, *BLAM!*, 92.

making the painting seem more mechanical, less ruled by the artist's emotions. William Rubin, art historian and friend of Stella, states: "The bands of the *Aluminum* pictures were applied in a way that left far fewer traces of the artist's hand. The surface was more even and the edges were cut sharply 'as with a slash tool' (a small angled brush which house painters use to cut around the molding of windows)."³¹ Already the *Aluminum* series appeared rather different from the *Black* series. The metallic paint lent itself better to the mechanical look of the ruled stripes because of its material origins in industrial metals.

An additional change in the *Aluminum* works was the introduction of the shaped canvas— an innovation that art historians have hailed as the apogee of the art object. When the public returned to the Leo Castelli Gallery in 1960 (27 September – 15 October) for the opening of the *Aluminum Paintings*, symmetrically cut indentations and notches supplanted traditional rectangularity. In *Six Mile Bottom* (Fig. 6) for example, Stella created symmetrical compositions with cut edges and even introduced a rectangular notch in the center of the canvas. The stripes now paralleled the structure, following a directional pattern that accentuated the notches and attracted the eye toward the shape. Rosenblum writes, "The result was a picture or, in some ways, an object of extraordinary tautness and indivisibility, in which the area of pictorial illusion and the palpable boundary that defined this illusion were suddenly confounded."³² Stella's new paintings were objects because of their

³¹ William Rubin, Frank Stella, 1970-1987, (New York: The Museum of Modern Art, 1970), 63.

³² Rosenblum, Frank Stella, 21.

disavowal of the traditional, rectangular canvas and their emphasis on unifying a cut shape through depicted pattern. Moreover, Stella created objects by relinquishing surface as a space of illusion. Michael Fried, author of *Three American Painters: Kenneth Noland, Jules Olitski, Frank Stella*, describes how others viewed the industrial object potential:

His progression...can be fitted neatly into a version of modernism that regards the most advanced painting of the past hundred years as having led to the realization that paintings are nothing more than a particular subclass of *things*, invested by tradition with certain conventional characteristics (such as the tendency to consist of canvas stretched across a wooden support, itself rectangular in most instances) whose arbitrariness, once recognized, argues for their elimination...that paintings are in no essential respect different from other classes of objects in the world...³³

Coupled with the new shapes, the three-inch wide stretcher bars, also used in the *Black* series, caused the paintings to project into the gallery space. Haskell describes, “The result was so totally divested of extrapictorial significance that it seemed to be more an object in itself than a painting...This painting-object was as palpably present as anything else in the viewer’s space.”³⁴ Furthermore, the idea of the object removed emotion, making it seem like a lifeless *thing*, intentionally omitting the encompassing cloak of the Abstract Expressionist mural.

It is also pertinent to revisit Stella’s method of arranging stripes, for upon examination of Stella’s notes from the Pratt Lecture, the method generates a mechanical repetition. A concise outline of his method appeared in his notebook in exact form:

³³ Michael Fried, *Three American Painters: Kenneth Noland, Jules Olitski, Frank Stella*. (Cambridge: Meriden Gravure, 1965), 43.

³⁴ Haskell, *BLAM!*, 92-93.

1. decoration +
structural
mid
REPETITION

2. result: the
thing itself
how a stripe
works³⁵

The described method carried Minimalist appeal, for there is no doubt that Stella's stripes established the supremacy of structure and seriality that would become characteristic elements of Minimalism and Pop art. By introducing metallic paint in combination with repetition and non-referential abstraction, the *Aluminum* series predicted the most important elements of Minimalism and attempted to project a cold, emotionless surface. Stella even experimented with a series of smaller, square paintings from 1959 that were covered in metallic tape and were even more geometrically exact than the *Aluminum* series. The edges of Burglar-alarm tape on Masonite board created straight lines, such as on *Jill* (Fig. 7). Flat and ordered, *Jill* demonstrates a brief departure from painting and a real interest in construction with a manufactured, non-art material.

Yet as 'nonartistic' and mechanical as they might seem, the *Aluminum Paintings* should not be considered a strict departure from emotion and the artist's touch. Jones observes that the subject of the paintings was roughly taller and wider than Stella with his arms spread tall and wide. These shapes preserve a human element, and are not simply mechanical, cold manifestations of industrial metallic paint.

³⁵ Stella, *Untitled Lecture and Sketches at Pratt*, in Richardson, 79.

Moreover Stella still did not relinquish his signifying titles. In fact, it was the introduction of a second series of mystifying titles in the *Aluminum Paintings* that encouraged art critics to reevaluate the seemingly vacant *Black* paintings. As the 1960s progressed, other Minimalist artists became highly conscious of the self-referentiality of industrial metals. Works made of iron, steel, aluminum, Plexiglas, and other metals announced themselves as dull, shiny, dense, solid— any specific property of metal including its color. Rubin writes that such colors “are not the colors one often sees in nature... To the extent that they carry associations, these are associations to the world of man-made objects, particularly industrial products and machinery, with their more regular geometrical forms and sharply defined edges.”³⁶

Yet the *Aluminum* titles are incapable of such a limited reference, for Stella conveyed a potent theme of racing and speed to underscore the connotations of silver color. Stella has been arrested for speeding in upstate New York, and he even named his *Circuit Paintings* after international racetracks and dedicated a series of 1980 graphic designs to his race driver friend Ronnie Peterson who died from a crash in the 1978 Grand Prix.³⁷ In one *Aluminum Painting*, *Marquis de Portago* (Fig. 8), the title refers to a Spanish aristocrat, who in 1957, at the age of twenty-eight, was killed in an auto race. The tragedy caused casualties and took the lives of spectators as well. To merely reference Stella’s fascination with racing cars, as so many art historians have done, is to ignore the fact that this painting is a memorial, an abstract representation

³⁶ Rubin, *Frank Stella*, 61-63.

³⁷ Sidney Guberman, *Frank Stella: An Illustrated Biography* (New York: Rizzoli, 1995), 178.

of the velocity and the silver aluminum car that took the life of a human being. The works are not simply about racing, but a speed that is connected to death. For Stella, the canvas was a space to hint at a story, a blurred and emotionally complex snapshot of a life.

One of the major debates that emerged around the treatment of silver aluminum paint was whether the silver *reflected* the surrounding light conditions, or whether the brushstrokes *repelled* light and color. Michael Fried's contemporaneous assessment of the reflective quality of aluminum paint in *Three American Painters* (1965) is rarely seconded. Whereas modernists theorized how the work assumed the identity of an object, Fried proposed that the *Aluminum Paintings* became dematerialized and disembodied. Neither object nor 'thing,' Fried believed the silver painted works removed awareness of the picture-plane. Through the play of light off the metallic specks of paint, the surface became divested of its materiality. Fried writes,

...his use of metallic paint, rather than seeming to signify 'thingness' or materiality pure and simple, seems instead to be his way of achieving something like the opticality brought about by staining and color in the work of Louis, Noland, and Olitski...the gentle play of granulated reflected light off metallic stripes has the effect of dissolving one's awareness of the picture-surface as a tactile entity in a more purely visual mode of apprehension...flatness is implied rather than experienced in tactile terms; and the metallic paint, despite its implications of materiality, in fact renders Stella's paintings curiously disembodied.³⁸

In Fried's view the play of light moved along vibrating stripes and projected an otherworldly gleaming skin.

³⁸ Fried, *Three American Painters*, 44-45.

On the other hand, Caroline Jones and William Rubin identify Stella's *Aluminum* series as repellent surfaces in a trend toward what Rubin called *thingness*, an instance of the non-art object. In a 1969 interview with Rubin, Stella described the metallic repellency:

The aluminum surface had a quality of repelling the eye in the sense that you couldn't penetrate it very well. It was a surface that wouldn't give in, and would have less soft, landscape-like or naturalistic space in it...It identifies as its own surface, yet it does have a slightly mysterious quality in one sense. You know it's on the surface, but it catches just enough light to have a shimmer. That shimmering surface has very much its own surface illusionism, its own self-contained space. You can't quite go into it...³⁹

The idea of repellency is the startling polar opposite of the imaginatively penetrable space of Pollock's canvas. By calling attention to the "illusionism" in a predominantly repellent surface, however, Stella admitted to the deliberate ambiguity of his works. Whereas in the Glaser interview of 1966 Stella still insisted on the literal, unambiguous interpretation of his works, in 1969 he had alluded to the surface illusionism that complicated the earlier reading. By creating surface repellency, it was difficult to enter Stella's personal psycho-sociology as discussed by Richardson. In contrast, Jones saw the repellent paint as an extension of a "shallowness of psychological intent, directly opposed to the Freudian depth models of an earlier Abstract Expressionism."⁴⁰ Yet somehow viewers did unfold meaning in Stella's supposed blank canvases. Whereas the gesture and layers in Abstract Expressionist canvases directly encouraged a psychological depth, Stella's displaced psychological meaning to the surface of the paint and the content of his titles.

³⁹ Frank Stella, Interview with William Rubin, June or Sept. 1969 in Rubin, 60.

⁴⁰ Jones, 211-212.

The *Aluminum Paintings* ultimately retain their objectness as a consequence of the shaped canvas. Although the paint is reflective, they are not so luminescent as to completely dissolve presence in a gallery. The quality of the reflection is not that of a mirror, but perhaps more of a distorted blur, therefore retaining an illusionism as Stella later began to admit. More importantly, the paint projects light into the space of the gallery. Rather than signifying a disavowal of psychological intent, the repellency of the aluminum paint displaces meaning to the picture's surface. It is essential to consider repellency as a powerful means to engage human interaction in the gallery as the industrial gleam creates a socializing atmosphere and the intriguing titles recall collective knowledge. Combined with the shaped canvas, Stella's works assume an identity as object, and "spoke of being 'in the real world' and not in the studio"⁴¹ according to Jones. Though the author's analysis identifies the work as objects of the everyday world, the *Aluminum Paintings* should be seen as objects that maintain their fine art presence in the *gallery*. The work not only encourages a deeper meaning relating to racing, speed, and death, but it deals with a global psycho-sociology through the connotations of titles. The artist's writings are beset with contradictions that aptly reflect the interpretations of his work. As a metaphor for Frank Stella's work, the statement "What you see is what you see," presents a façade that displaces meaning to the illusionistic surface. Likewise, the silver aluminum color repels an individualizing penetration into the canvas, and instead encourages a collective, socializing conscious in the center of the gallery.

⁴¹ Ibid., 150.

CHAPTER 3

DONALD JUDD: THE INDUSTRIAL ENVIRONMENT

Donald Judd joined Frank Stella in the creation of art objects in real space, pushing this notion further with an abandonment of painting and a simultaneous development of what he named the ‘three-dimensional object.’ When Judd had his first solo show at Richard Bellamy’s Green Gallery in New York (17 December 1963 – 11 January 1964), the artist exhibited an array of reliefs, boxes, and floor volumes. This installation interacted with the space in the gallery and established the importance of the multi-sensory experience of Minimalist work in the 1960s. Although Stella had introduced the shaped canvas in combination with an emphasis on seriality, geometrical pattern, and commercial metallic paint in the *Aluminum* series, his commitment to painting bound him to a pre-Minimalist camp. Minimalism strove to reject the pictorial illusion vital to the history of European painting, and so it was with the introduction of illusion-defying objects that Minimalism reached its apogee. The construction of Minimal art objects, epitomized by Donald Judd’s new work, caused a significant shift from the walls of the gallery towards the inner space of the gallery, producing a dynamic, physical experience for viewers. Author of *Minimalism: Art and Polemics* James Meyer writes:

Minimalism’s rejection of pictorialism implied a projection of literalness back into the viewer’s space. A whole shape devoid of internal relationships, the minimal object deflected attention to its setting. It was no longer a discrete

work, but ‘part of the situation’⁴² incorporating the room and the spectator; indeed, it functioned only within the terms of this co-extensive relation, or objecthood.⁴³

Although it is Judd’s artistic rival Robert Morris who is best known for a Minimalism connected to the viewer’s body, the construction of industrial objects generated a sense of human ‘presence’ in the gallery. A term used by Michael Fried in *Art and Objecthood*, ‘presence’ indicated the work’s address to the viewer. Judd never explicitly wrote about the interaction between art and the human body as Morris did,⁴⁴ but Judd’s writings are full of contradictions and his emphasis on installation is paramount. The sculptural-architectural presence of the work did create a need for the interaction of art and viewer in public spaces. Whereas Stella displaced meaning to the titles of his work, Judd intended a purely self-referential meaning created by the specific industrial medium. Yet Judd’s installations and materials confirm there is meaning to be found in both surface illusionism and the actual fabrication methods of the industrial works, suggesting various associations with power, democracy, and American consumerism. Above all, the industrial works favor an experience of color and light that insists on locating meaning in the encounter of the surfaces, volumes, and physical space of the installation.

⁴² Michael Fried, “An Introduction to My Criticism,” *Art and Objecthood: Essays and Reviews*, (Chicago: University of Chicago Press, 1998), 16.

⁴³ Meyer, 231.

⁴⁴ For Morris’s account of art’s relationship to the human body, see Robert Morris, Notes on Sculpture,” *Artforum* 4, no. 6 (February 1966): 42-44.

Even before Judd published his seminal essay “Specific Objects” in 1965,⁴⁵ his one-man show at the Green Gallery announced his desire to abandon the practice of painting for the production of objects. There were a total of nine works, including four wall reliefs and five objects (Fig. 9). Although the reliefs hung on the wall like paintings, and therefore seemed like transitional works, they were made of wooden panels wedged between metal cornices or were metal sheets punctured with holes. Because of the introduction of sheet metal, their presence was more sculptural than the effect of Stella’s three-inch wide stretcher bars on the *Aluminum* canvases. The horizontal and vertical lines of the various cubes and shapes carried the viewer around the exhibition space. Meyer writes, “as an ensemble, they marked the coordinates of the gallery site.”⁴⁶ At this point in Judd’s career, the grainy quality of woodwork or the punctured metal holes still carried associations with craft, calling attention to the artist’s touch. Within a few months, however, Judd switched over to industrial fabrication methods, employing the Bernstein Brothers and Treitel-Gratz⁴⁷ in pursuit of a more mechanically produced result. In essence the decision transformed the role of the artist into that of a designer, and would cause Clement Greenberg to object to the ‘designed’ Minimalist work in “Recentness of Sculpture.” In this 1967 catalogue essay for the Los Angeles County Museum of Art show

⁴⁵ Judd wrote “Specific Objects” in 1964 but the essay remained unpublished until it was printed in *Arts Yearbook* 8 at the end of 1965.

⁴⁶ Meyer, 56-57.

⁴⁷ Treitel-Gratz was also the favored fabricator of metal works for artists Isamu Noguchi, Sol LeWitt, Walter de Maria, Robert Indiana, Maya Lin, Barnett Newman, and Alexander Liberman.

American Sculpture of the 1960s, Greenberg discussed Judd's wall reliefs as "Dadaesque gestures,"⁴⁸ exemplifying a non-art practice that denies traditional notions of aesthetics.

Although Greenberg saw emotion in Stella's commitment to painting and disliked Minimalism, Judd and Stella can be compared via their intentions to deny the illusion they saw in European art— intentions that were not always realized. Barbara Haskell writes, "Judd's relationship to Stella's work was based on the adamant objection both artists had to the European compositional formula of balancing one part of the painting or sculpture against another."⁴⁹ Judd agreed with Stella that European pictorial illusion and composition strategies were dated, but he saw Stella's work as the end of painting. Judd therefore challenged Greenbergian Modernism, advocating the potential of literal art through the three-dimensional industrial object in "Specific Objects."

Published in *Art Yearbook* 8 in 1965, "Specific Objects" emerged as the seminal essay of Minimalist intention. Judd's main attack on painting was its adherence to the rectangular plane hung flat on a wall. The rectangle itself was a limiting shape, and suggested a "boundary" and an "end of the picture"⁵⁰ within

⁴⁸ Clement Greenberg, "Recentness of Sculpture," in *American Sculpture of the 1960s*, ed. Maurice Tuchman (Los Angeles: Los Angeles County Museum of Art, 1967), 24-26, in *Minimal Art: A Critical Anthology*, ed. Gregory Battcock with an introduction by Anne M. Wagner (New York: E.P. Dutton & Co., Inc., 1968), 180-186.

⁴⁹ Haskell, *BLAM!*, 93.

⁵⁰ Donald Judd, "Specific Objects" (1965), in Donald Judd, *Complete Writings: 1975-1986*, 1000 ed. (Eindhoven: Van Abbemuseum, 1987), 116.

which parts of the composition could only react to the determining edges of the frame. Instead, Judd proposed the ‘three-dimensional object,’ a neutral form that was neither painting nor sculpture. Although the physicality of the material resembles sculpture, Judd saw the works as “nearer to painting,” due to a frequent allegiance to the wall. The artist considered the new work to have exceeded painting in “plain power” as well. Although not the only consideration, power resulted because of the three-dimensional form’s clarity and from its exploitation of industrial materials. Judd writes,

Oil paint and canvas aren’t as strong as commercial paints and as the colors and surfaces of materials, especially if the materials are used in three dimensions. Oil and canvas are familiar and, like the rectangular plane, have a certain quality and have limits. The quality is especially identified with art.⁵¹

Keenly aware of his non-art practices, Judd felt that the new work should embrace a specificity associated with the color of industrial materials. He describes John Chamberlain’s crumpled tin sculptures as having a neutral metal color, sensitive and integral to the material. “Color is never unimportant,”⁵² Judd declares. Confounded with the use of a three-dimensional form in actual space, the intrinsic qualities of the materials produced a specificity that supposedly referred to nothing outside of its own material identity.

Materials vary greatly and simply materials – formica, aluminum, cold-rolled steel, Plexiglas, red and common brass, and so forth. They are specific. If they are used directly, they are more specific. Also, they are usually aggressive. There is an objectivity to the obdurate identity of a material. Also, of course, the qualities of materials – hard mass, soft mass, thickness of 1/32, 1/16, 1/8 inch, pliability, slickness, translucency, dullness – have unobjective uses...

⁵¹ Ibid., 118.

⁵² Ibid., 120.

Most of the new materials are not as accessible as oil on canvas and hard to relate to one another. They aren't obviously art. The form of a work and its materials are closely related. In earlier work the structure and the imagery were executed in some neutral and homogenous material...⁵³

In addition to metallic qualities, Judd's definition of specificity meant that a work's material and its connotation of color could refer only to itself. No external references were meant to cloud a work's meaning. Unlike Stella, Judd rarely named his work, and chose to allow the metal to speak for itself as a specific object.

A three-dimensional object, *Untitled* of 1965 (Fig. 10), projects seven stacked boxes from the wall in an arithmetically ordered design so that the stack is evenly spaced and the distance between each box equals the height of one box. The stack is not meant to suggest anything but its own specificity as a strong, clear shape and pure, unambiguous industrial material. Unambiguous it is not, however, as the construction of the box is completely hidden from the viewer's eye. Although Judd's writings criticize illusion in painting, the hidden clamps and nails used to attach the boxes to the wall indeed produce an illusion. In *7 Sculptors* artist Robert Smithson notes, "It is impossible to tell what is hanging from what or what is supporting what...An uncanny materiality inherent in the surface engulfs the basic structure...making these very definite works verge on the notion of disappearance."⁵⁴ Smithson's analysis of the work's disappearance is comparable to Fried's theory of dematerialization concerning Stella's *Aluminum* series. Smithson is correct in

⁵³ Ibid., 122-123.

⁵⁴ Robert Smithson, "Donald Judd," in *7 Sculptors* (Philadelphia: Institute Contemporary Art, 1965), in *The Writings of Robert Smithson*, ed. Jack Flam (Berkeley: University of California Press, 1996), 6.

indicating the illusion of construction, yet Judd's work certainly does not disappear. In fact, the work's three-dimensional projection is paramount to the concept of real space in its alteration of installation practices.

Many scholars have noted the disjunction between Judd's writing and artistic practice, particularly through the use of color and illusion in the metallic surfaces. In *Donald Judd: Colorist*, the authors repeatedly call attention to Judd's use of color in conjunction with his academic training in color theory. The catalogue portrays Judd as an intellectual, keenly aware of connotations of color due to his study of philosophy and art history at Columbia University. Research reveals that Judd took courses on color theory and was particularly interested in the work and theories of Josef Albers, summarized in Albers' 1963 book *The Interaction of Color*.⁵⁵ Furthermore, curators today continue to see the potential of pairing the two artists' work on the aesthetics of color, as demonstrated by the recent exhibition "Josef Albers/Donald Judd: Form and Color" (26 January – 24 February 2007) at PaceWildenstein Gallery in New York.

The galvanized iron of *Untitled* (1965) does not have symbolic meaning such as the black or aluminum paint in Stella's oeuvre, but it does produce a surface variance. The galvanization chemical process is a way of coating the metal with zinc to prevent rusting. When the metal is bathed in acid, it is then hot-dipped in zinc. As the zinc dries, the deposits leave a spotted, crystallized appearance that is perhaps more interesting to the eye. For other artists of the twentieth century, the process of

⁵⁵ Dietmar Elger, *Donald Judd: Colorist*, (Hannover: Hatje Cantz Publishers, 2000), 1-13.

galvanization did signify further meaning. Marcel Duchamp, the French-born American Dadaist and Surrealist, galvanized his small, erotic sculptures of the 1950s, such as *Female Fig Leaf* (1950) and *Not a Shoe* (1950). For Duchamp, galvanization was an erotic metaphor. Judd's *Untitled* (1965) does not contain symbolic meaning or subtle metaphors, but it does have a spotted illusion developed by the chosen method.

Besides inherent metal colors, red proved to be the one color that Judd believed had clarity of form. In the early 1960s, Judd preferred cadmium red light as the ideal color to articulate form and shape of the object. In an interview with John Coplans in 1971, Judd stated, "red, other than a gray of that value, seems to be the only color that really makes an object sharp and defines its contours and angles."⁵⁶ Because Judd ideally favored the intrinsic color of the metal, his enchantment with the color red seems like an aberration from his philosophy. The artist extensively wrote and spoke about red, not only in the Coplans interview, but also during a lecture at the Department of Art and Architecture of Yale University in 1983,⁵⁷ proving that his opinion about the color was constant as his work matured.

An installation of works from 1964-68 at the Chinati Foundation/La Fundación Chinati is one of Judd's most potent expressions of the color red (Fig. 11). Against the exposed brick walls and the concrete floors, the red three-dimensional

⁵⁶ Donald Judd, "Don Judd," interview by John Coplans, in Don Judd, ed. John Coplans (Pasadena: Pasadena Art Museum, 1971), in Donald Judd: Escultura, Gravura, Mobiliario/Sculpture, Prints, Furniture, ed. Margarida Veiga (Lisbon: Centro Cultural de Belém, 1997), 28.

⁵⁷ Donald Judd, "Art and Architecture," from a Lecture at the Department of Art and Architecture of Yale University; 20th of September, 1983, in Judd, Complete Writings, 25-36.

objects pop from their backgrounds as distinct forms. The intense, natural sunlight from the warehouse windows shines upon the work and illuminates the surface, producing what Elger describes as “a vibrant optical presence in the space.”⁵⁸ Cadmium red light suggests additional associations for Elger and author William C. Agee in *Donald Judd: Colorist*. Agee suggests that numerous references in Judd’s life contributed to his attraction toward red.⁵⁹ Judd began to write about the precise influences just a year before his death, in a pertinent essay entitled “Some aspects of color in general and red and black in particular.” As a child in Nebraska, the red and black colors of the Lakota Indians were one such influence. Additionally, on an important visit to the Philadelphia Museum of Art in 1947, Judd saw a Rogier Van der Wyden altarpiece and the Neo-Plasticist compositions of Piet Mondrian in which red is part of the dynamic balance of shape and form.⁶⁰ Neither symbolic nor accessible for a general public, Judd’s connotations of red were not like Stella’s black or aluminum. Red had an outward clarity, but also a personal psycho-sociological meaning for Judd. Likewise, Stella’s art objects suggested personal memories and associations even if some paintings are titled after friends and are more comprehensible. The use of Nazi titles in the *Black Paintings* encouraged collective memory yet is also somewhat obscure. Through their subtle protrusion, the *Aluminum Paintings* began to foster a collective physical space in the gallery. Judd’s installation

⁵⁸ Elger, 18.

⁵⁹ William C. Agee, “Donald Judd and the Endless Possibilities of Color,” in *Donald Judd: Colorist*, ed. Elger, 35.

⁶⁰ Donald Judd, “Some aspects of color in general and red and black in particular” (1993), in Elger, 79-116.

practices, however, revolutionized the way artists and viewers began to discover *real* space.

In comparison with painted red objects, the clear anodized aluminum and purple Plexiglas of *Untitled* (1969) is ambiguous (Fig. 12). Although Judd would have claimed this box was specific because of its metallic identity, the surface illusion is full of complexities. The purple Plexiglas appears scratched and drawn on, reminiscent of the burnishing techniques of David Smith's *Cubi* series. As Rosalind Krauss describes, Smith's work was "rendered further weightless and immaterial by the finish on the steel: a kind of calligraphic sanding of the metal so that the surfaces appear as a flickering, evanescent denial of the mass that supports them."⁶¹ Smith also composed sculptural geometric shapes in order to create relationships and frame central voids such as in *Cubi XXVII* (March 1965) at the Solomon R. Guggenheim Museum in New York (Fig. 13). In this way, the gestural steel surfaces and the framed spaces consciously refer to the texture of painting and the picture frame, as viewers gaze through the void at a skyline of New York. Judd's practice did not share the same intensity of illusion, but his geometric relationships inadvertently share similar qualities. The combination of materials in *Untitled* (1969) creates reflections of multiple colors across different planes due to the fall of intense sunlight from the windows above. The light alters the composition of the work by creating shadows and obscuring the clarity of shapes. The anodization process coats the surface of the metal with an oxide layer in order to increase corrosion resistance and allow dyeing. In this

⁶¹ Rosalind Krauss, "Allusion and Illusion in Donald Judd," *Artforum* 4, no. 9 (May 1966): 26.

case the aluminum is clear, allowing pure light to seep through, permitting the purple hue to dominate the composition.

The story of Judd's connection to the color red points toward personal associations and the metallic shimmer indicates illusionistic, ambiguous planes of color similar to the Abstract Expressionist color fields. Even Judd's geometric construction of objects on a large scale implies meaning that was not immediately grasped by viewers in the early sixties. Brian O'Doherty's *New York Times* review of the winter Green Gallery show in 1964 claimed, "[the work] tries to achieve meaning by a pretentious lack of meaning...[the show] obligingly expires before one's eyes, in a form of suicide."⁶² Judd's construction of meaning was neither obvious nor intentional, yet the meaning could be found in geometric structure. The works' 'plain power' as whole, unified works took on a democratic, 'American' identity. If Judd's art was a polemical reaction against European compositions and illusion, then what he attempted to produce was the opposite of that European art historical tradition. Jutta Held described the role of industrial technology in assuming an American identity:

The theorists of Minimalism have pitted their art against European tradition. 'We are making it out of ourselves,' Judd says, attempting to emancipate himself from this tradition. Adopting a competitive position toward European artists, the American artists have become totally affirmative of American industrial society. As the Minimalists stress, their inspiration comes from this technologically organized world not European artistic traditions...This belief in science and technical rationality as the basis of a worthwhile existence and in the superiority of American civilization...is reflected in the theories of Minimal Art and certainly in the forms of their products.⁶³

⁶² Brian O'Doherty, "Exhibitions at Galleries," New York Times, 14 December 1963.

By mathematically ordering the three-dimensional objects and making each part equal, the entire industrial work resembled the qualities of American democracy. Meyer writes, “His vocabulary of repeated metal boxes suggested a radical new meaning for seriality...his industrially made objects were purged of arbitrariness, directing attention to the work’s shape, materials, and generative scheme.”⁶⁴ The even intervals between the stacked boxes clearly enabled this interpretation, as did the *Progressions* that Judd introduced in 1964. The forms were semi-circular objects, mounted horizontally in either condensed or even distances on the wall. One option chose equal sub-elements that were set apart at even distances. The far more complex version utilized mathematical sequences intended to avoid hierarchical compositions by appearing ordered, not achieved by an artistic vision. Judd frequently used the Fibonacci series (named for the mathematician and philosopher Leonardo Fibonacci in thirteenth century Italy) or one construction from the following pattern: 11 + 1 + 6 + 2 + 3 + 3 + 2 + 6 + 1 (underlinings indicate units rather than spatial intervals). Although the patterns are entirely unclear to the average viewer, each series utilizes a mathematical formula. Elger describes the progressions as “anti-compositional,” whose “sequences of equal-status elements abolish any form of hierarchy, and establish an egalitarian principle in which no one individual element may be set above or below any others. Independently of their position within a holistic object,

⁶³ Jutta Held, “Minimal Art: eine amerikanische Ideologie” (1972), in Minimal Art: Eine kritische Retrospective, ed. Gregor Stemmrich (Dresden: Verlag der Kunst, 1995), 458-9., trans. Meyer, 264.

⁶⁴ Meyer, 172.

each element claims the same value as the others.”⁶⁵ This non-hierarchical principle signifies the very ‘American’ mark of equality.

Richard Shiff’s essay “Donald Judd: Fast Thinking” also emphasizes the political implications of polarized compositions. In a lecture at Harvard and in subsequent writings about Jackson Pollock, Judd conceived ‘polarity’ as how individual parts of Pollock’s paintings related to the whole.⁶⁶ A fragment of a drip-painting was essentially a smaller version of the whole, a mini-painting of itself. The portion represented a localized particularity of the generality of the whole. The same logic, Shiff asserts, can describe Judd’s three-dimensional objects involving the relation of parts to the whole, such as in the *Progressions*. Shiff writes that the works “can be an emblem of localized democracy – a case of polarity in wholeness. Like Newman and Pollock, Judd was very ‘American.’”⁶⁷ The industrial fabrication not only indicated an American consumer society, but through its construction it resembled a non-hierarchical, democratic structure.

The principle of democracy and equality can also be experienced via Judd’s revolutionary installation practices, which the artist employed in an extensive vision at the complexes in Marfa, Texas. In 1973 the artist purchased a city-block-sized land in Marfa, Texas that included warehouse structures and a two-storied residential house. The “sparsely populated,” “uncluttered landscape,” and intense sunlight

⁶⁵ Elger, 24.

⁶⁶ Donald Judd, “Jackson Pollock” (1967) in Judd, Complete Writings: 1959-75, 195.

⁶⁷ Richard Shiff, “Donald Judd: Fast Thinking,” in Donald Judd Late Work, ed. PaceWildenstein (New York: PaceWildenstein, 2002), 18.

attracted the artist for its degree of “visual clarity.”⁶⁸ Judd moved to the complex and founded The Chinati Foundation in order to preserve the large-scale installations of a few artists. Marfa appealed to Judd for its vast space that could encompass the permanent installations that he envisioned. The Marfa site “could realize his vision of architecture, art, and life joined together in a union in which culture was not something ‘that provisionally lies outside’⁶⁹ of life, but was an integral part of the whole.”⁷⁰ In the artillery sheds at Chinati (Figs. 14-15), Judd’s gleaming surfaces refract a spectacular display of light, creating a dramatic theatre of real space. Together the north and south sheds contain one hundred works, requiring viewers to move around the boxes and shift their perspectives. Due to the floor to ceiling windows, the reflected color flickers across the concrete floors and creates subtle variances on the surfaces of the cool aluminum and warm brass materials. The experience encourages the union of all works in the room, creating a total atmosphere and satisfying a notion of collective space. The integration of art and architecture was one of the great tenets of the Marfa complex. Judd writes,

Art and Architecture – all the arts – do not have to exist in isolation, as they do now. This fault is very much a key to the present society. Architecture is nearly gone, but it, art, all of the arts, in fact all parts of the society, have to be rejoined, and joined more than they have ever been. This would be democratic in a good sense, unlike the present increasing fragmentation into separate but

⁶⁸ For an extensive description of the Marfa compound, see Barbara Haskell, Donald Judd, (New York: Whitney Museum of American Art, 1988), 117-145.

⁶⁹ José Ortega y Gasset, quoted by Donald Judd in “The Chinati Foundation,” chap. in The Chinati Foundation, ed. Donald Judd (Marfa, Texas: The Chinati Foundation, 1987), unpaginated.

⁷⁰ Haskell, Donald Judd, 124.

equal categories, equal within the arts, but inferior to the powerful bureaucracies.⁷¹

The installations of Marfa embody the collective experience of Minimal art as Stella's *Aluminum* series subtly suggested. Anna Chave claimed the Minimalist object "is perceived as exhibiting a cruel taciturnity and disinterest in the spectator, as its extreme simplicity and dearth of detail act to distance viewers and to repel the close scrutiny they expect to bring to works of art."⁷² The lack of specific detail may be distancing according to Chave; most importantly, it is the material surface of the industrial materials that causes impenetrability. Additionally, Chave's analysis of the repellency of the Minimalist object relates to the supremacy of experience of Stella's *Aluminum* series and Judd's installations, pushing viewers out of the work and keeping them in the central exhibition space. Although distanced from the surface, viewers are the crucial final element in Judd's empirical philosophy. Even though he employed industrial fabricators, the work was not complete until Judd granted in-person, experiential approval. A similar relationship was created by the collective experience of viewers in Judd's architectural installations. Despite Chave's theory that the surfaces *rejected* viewers, the works *displaced* meaning to the central space.

As Michael Fried claimed in *Art and Objecthood*, Minimal art was therefore a "literal art." "The experience of literalist art is...one which, virtually by definition, includes the beholder," Fried wrote.⁷³ Pitted against Greenbergian Modernism, which

⁷¹ Donald Judd, "Art and Architecture" (1983), in Judd, Complete Writings, 111.

⁷² Chave, 55.

⁷³ Fried, Art and Objecthood, 16.

held that works of art should have unified, self-reflexive feeling and meaning, Judd's Minimal industrial works attempted to reject the European tradition of composition and illusion that still existed in the Abstract Expressionist canvas. Whereas the individual can find emotion and meaning within the layers of paint within a Pollock or Newman, the industrial installation appears designed to encourage a collective experience *without* presenting overt meaning. The meaning of Judd's art arises from a dazzling interaction of art, architecture, and installation.

CHAPTER 4

ANDY WARHOL: THE SILVER OBSESSION

“If you want to know all about Andy Warhol, just look at the surface of my paintings and films and me, and there I am. There’s nothing behind it.”⁷⁴ The interview with Gretchen Berg from which this statement was taken was ironically titled “Andy: My True Story.” It is not that the statement is false, but Warhol self-consciously comments on the lack of substance in his own words. The quotation has since become so attached to the artist’s identity that in 2002 the United States Post Office issued a Warhol stamp with this exact quotation on its selvage.⁷⁵ Of the artists in the 1960s, Andy Warhol constructed the most mysterious identity about himself and his art. In fact Berg’s interview opens with a statement from Warhol: “I’d prefer to remain a mystery...It’s not that it’s part of my image not to tell everything, it’s just that I forget what I said the day before and I have to make it all up over again.”⁷⁶ But this façade was indeed part of his image. Warhol surrounded himself with celebrities, cultivating numerous relationships with Hollywood stars, wealthy art connoisseurs,

⁷⁴ Andy Warhol, “Andy: My True Story,” interview by Gretchen Berg, Los Angeles Free Press (17 Mar. 1967): 3, in I’ll Be Your Mirror: the Selected Andy Warhol Interviews: 1962-1987, Kenneth Goldsmith (New York: Carroll & Graf, 2004), 85.

⁷⁵ Goldsmith, 85.

⁷⁶ Warhol, “Andy: My True Story,” in Goldsmith, 87.

and other famous personalities, yet he rarely let people know the real Warhol. In part this was because Warhol wanted to maintain an enigmatic aura surrounding his art; he saw his identity and his work as inextricably linked.

Warhol displaced meaning, as Stella and Judd did, by purposefully deflecting any critical analysis. Thomas B. Hess writes in “Pop and Public,” “Pop artists themselves have kept strangely mute about aims, about their sense of identification and identity, attitudes towards subject matter and content, techniques and style.”⁷⁷ Yet just as Stella began to admit surface illusion or as Judd revealed theories about color, Warhol also exposed his attitudes toward color, particularly the color silver rendered through metallic mediums. An aluminum box or industrial processes exemplified the specific, inherent qualities of the metal for Judd and the Minimalists. For the Pop artists who used industrial materials, however, metallic colors connoted a broad range of meaning. The general American public links Warhol to images of Campbell Soup or Marilyn Monroe, but what most people do not realize is that Warhol’s oeuvre reveals an obsession with the color silver. Because “surface” revealed the artist’s identity and intentions, the prolific metallic silver silkscreens, the Silver Factory (Fig. 16), and the *Silver Clouds* (Fig. 17) significantly established meaning for Warhol. Writings and interviews with the artist reveal that silver had associations with industry, the machine, the Hollywood silver screen, and glamour.

If the public misunderstood Minimalism for cold and straightforward, then Pop art was a welcome change, met with initial enthusiasm. Pop art, or the visual

⁷⁷ Thomas B. Hess, “Pop and Public.” Art News (November 1963), in Pop Art: A Critical History, ed. Steven H. Madoff (Berkeley: University of California Press, 1997), 100-102.

representation of popular mass culture, appeared as the polar opposite to Minimalism's lack of representational imagery. Yet the use of repetition and a desire to displace meaning to the surface were two crucial similarities between the concurrent movements of Minimalism and Pop. Despite the representation of consumer products, celebrities, and other recognizable icons, Warhol created flat picture planes that shared the repellency of Stella's *Aluminum* canvases. This flatness found in the silver surfaces of individual works and installations advanced a viewing public found in the industrial series of both Stella and Judd.

Warhol's first solo retrospective opened at the Institute of Contemporary Art at the University of Pennsylvania to an enthusiastic, if not rowdy public of two thousand, in a space that normally held seven hundred (Fig. 18).⁷⁸ On the night of October 8, 1965, students stepped onto the silver-painted floors at the ICA in an ecstatic frenzy described by Leo Castelli as "just a howling...like the Beatles" or the Pop art's embodiment of "the peak of media insanity" according to Henry Galdzahler.⁷⁹ The scene became so unruly that campus security police had to escort Warhol and his entourage to the safety of a stairway overlooking the main room. Upon exiting through a trap door in the ceiling, Warhol and his female alter ego Edie Sedgwick had to descend a fire escape in order to avoid the fanatic mob. Although this riotous exhibition opening was not typical, the event indicates the extreme enthusiasm for Warhol. More importantly, the opening suggests the socializing

⁷⁸ Victor Bockris, Warhol: The Biography, (New York: Da Capo Press, 1997), 233.

⁷⁹ Leo Castelli and Henry Galdzahler quoted in Bockris, 233-234.

atmosphere that he embraced. Whereas Stella's *Aluminum Paintings* or Judd's Marfa installations quietly gathered viewers in the center of a gallery, Warhol's Pop art screamed for attention. His celebrity status, combined with a general excitement about Pop art, assembled audiences in a dramatized, collective space.

It was significant that Sam Green, the curator of the Warhol retrospective at the ICA, painted the floors of the exhibition space in silver metallic paint. Warhol's insistent use of silver during the 1960s created a spacey, near-theatrical aura around the artist and his work. Warhol cleverly integrated the color into the body of his work, indicating a multiplicity of readings via the surface. A clear example is the iconic image of *Brillo* (Fig. 19) that bares the slogan, "Shines Aluminum Fast." The language not only refers to the cheap consumption of the material as the readily available and ordinary substitute for silver, but its repetition in *Brillo* installations is consistent with the Pop art mentality of consumer culture. Warhol's insistence that his works stop at the surface indicates that meaning is to be found in the language, the flat image, the material, or the outermost part of the work that confronts the outside world.

For Warhol, the color silver signified an industrial aesthetic that defined his physical world growing up in Pittsburgh. The landscape of this city was crowded with unsightly steel and coal factories and polluted from the resulting smog. The author of *A Social Study of Pittsburgh* (1938), Philip Klein wrote:

To understand Pittsburgh one must conceive of it as a huge factory with a national market as its perspective...The forces that control its destinies are basically economic, are forces that move with the large strides of national progress and regression. The depression hit Pittsburgh harder than other areas

where industries were less predominant...The traditional optimism of the American people yielded to dismal pessimism...⁸⁰

At the time when Klein wrote his account, Warhol was ten years old and was experiencing the height of the Depression and its aftermath. Recalling the memory of his childhood in gloomy Pittsburgh, Warhol named his New York art studio “The Factory.” The studio’s title called upon Warhol’s fascination with his roots in industrial America as much as it referred to the postwar economic boom. By the early 1960s, mass production defined consumer culture, and like the economic basis of American industry, Warhol intended to “be a machine,”⁸¹ as he declared in an interview with Gene Swenson in 1963. Whereas previous artists created single works, Warhol’s silkscreen method reproduced multiples that acknowledged their status as commodity objects. “You see, the way I do them, with my technique, I really thought I could do four thousand in a day. And they’d all be masterpieces because they’d all be the same painting,” the artist wrote in *The Philosophy of Andy Warhol*.⁸² The significance of Warhol’s Factory lay in its connection to the capitalism of its age. Moreover, in *Machine in the Studio*, Jones writes that “Warhol’s social machinery generated the Factory in place of the studio; for Stella, theatrics were besides the point.”⁸³ The author’s commentary points toward a third meaning of the Factory. Not

⁸⁰ Philip Klein, *A Social Study of Pittsburgh* (New York: Columbia University Press, 1938) in Bockris, 20.

⁸¹ Andy Warhol, “What is Pop Art,” interview by Gene Swenson, *Art News* (November 1963 – February 1964): 119.

⁸² Andy Warhol, *The Philosophy of Andy Warhol: (From A to B and Back Again)*, (New York: Harvest Books, 1977), 148.

only a reference to Pittsburgh and the commodity reproduction of the age, the Factory suggested the communal working environment in the studio. The concept and the design of the Factory encouraged a space of communal production that Stella did not employ and Judd only slightly developed through the employment of industrial fabricators. Judd's use of a specialized group of metalworkers within the industrial fabrication company hardly embodied the theatrical and glamorous atmosphere of Warhol's enterprise.⁸⁴

Painstakingly crafted by Factory regular Billy Name, known as Billy Name, the Factory at 231 West Forty-seventh Street was entirely covered in tinfoil and metallic paint in an effort to mimic the silver color of machinery. To cover the walls, Name used cheap Reynolds aluminum wrap, not coincidentally the most recognizable and accessible foil for the 1960s consumer. Using glue and an industrial staple gun, he obsessively covered even the metal pipes, spurred on by the effects of amphetamine according to Warhol⁸⁵ and Ondine,⁸⁶ one of the Factory's drag queen Superstars. Additionally, Name spray-painted DuPont Krylon industrial aluminum paint onto every remaining inch of the Factory down to the toilet bowl. Krylon industrial paint, normally used on metal surfaces to prevent rust, was developed in

⁸³ Jones, 150.

⁸⁴ For more on the role of labor in Judd's industrial fabrication process, see Josiah McElheny, "Invisible Hand," Artforum 42, no.10 (June 2004): 209.

⁸⁵ Andy Warhol and Pat Hackett, POPism: The Warhol '60s (New York: Harper & Row, 1980), 64-65.

⁸⁶ Ondine, interview by Patrick S. Smith (Fall 1978), Warhol: Conversations about the Artist (Ann Arbor: UMI Research Press, 1988), 278.

1947. By 1965, Krylon was the leading U.S. producer of aerosol paints.⁸⁷ Significantly, Warhol and Name used even the most common brand of aerosol paint, further encouraging a mentality of popular consumption. Name even prevented light from entering the building by painting the windows black, so only popping flashbulbs of electric light and metallic shine generated the eerie flecks of artificial light. Although the use of tinfoil produces a gritty, built-up texture, Name made sure to rewrap the crumbling walls every two weeks so the coated surface maintained a flat appearance. Additionally, the spray-painting method enabled the complete removal of the artist's hand, eliminating even the faint lines and brush-painted technique visible in Stella's work. Patrick Smith writes in *Conversations About the Artist*, "The glittering alternative to ordinary life represents a momentary cessation of the problems of life, and Warhol preferred to be a 'machine' in order to keep himself at a profound and voyeuristic distance."⁸⁸ In that sense, the physical distance created by the spray bottle accomplishes Warhol's machine aesthetics, and is analogous to the rupture he makes between the ordinary and the glamorous, fine art and anti-art.

Warhol assigned importance to his signature color in *POPism: The Warhol Sixties*: "...it was the perfect time to think silver. Silver was the future, it was spacey... And silver was also the past—the Silver Screen—Hollywood actresses photographed in silver sets...And maybe more than anything, silver was narcissism—

⁸⁷ "Krylon History," Krylon Products Group, 2007, 10 March 2007
<http://krylon.com/main/level_template.cfm?levelid=1&sub_levelid=1&content=sub_level>.

⁸⁸ Smith, 291.

mirrors were backed with silver.”⁸⁹ The origins of the meaning behind the “silver screen” are based on the role of silver salts in the invention of photography. A typical photographic film consists of crystals of slightly soluble silver salts such as silver nitrate, the chemical compound that produces light-sensitive film. Silver bromide is made from silver nitrate and is used to create classic black and white film. Due to the photochemistry of silver salts, glamorous Hollywood has come to be known as the Silver Screen. The Silver Factory embodied all of these ideas— it was the space of the celebrity, where Warhol’s Superstar entourage encouraged the impression of the Hollywood movie set. It was the progressive, futuristic atmosphere for an artist attempting to create new ideas and methods.

The Factory encompassed the all-out glamorous sensation that Warhol adopted as a recurrent theme. Steven Watson quotes Billy Name in his book *Factory Made: Warhol and the Sixties*: “It’s electric. It’s synthetic, it’s fusion. It’s out of the ordinary, and it’s tense and it’s hip and it’s cool and it’s spacey. It’s a knock-out Wonderland.”⁹⁰ Silver encased the Factory, transforming the space into a campy, strobe-lit atmosphere, where the reflective silver contributed to the narcissistic nature of the place, and where celebrities became multiplied and fragmented with their images reflecting off the walls. The Factory’s disorienting silver aura attracted visitors partly because of the effect it had on subjective experiences. As Warhol’s transformation of the space turned people *into* images, Factory visitors felt as though

⁸⁹ Warhol and Hackett, 64-65.

⁹⁰ Billy Name, interview by Steven Watson [April 29 and July 29, 1998 (audio); July 29, 1999; November 19, 2000; and July 11, 2002 (video)], *Factory Made: Warhol and the Sixties*, ed. Steven Watson, (New York: Pantheon, 2003), 126.

they were always right on the edge of stardom, craving a space of vanity even if their images were only blurred impressions of a clear reflection. David Bourdon describes a self-awareness that the distorted, mirror-like décor instilled—it was a place where “even outcasts could imagine themselves stars.”⁹¹ Warhol even wore silver wigs to reflect his silver obsession outside of the Silver Factory. In addition to Warhol’s transformation, other members of the entourage, such as Edie Sedgwick, dyed their hair silver to publicize the celebrity circle. Their appearance was an important extension of the Factory, functioning as a mirror for other people’s projected fantasies.

The shaped canvases and repellent aluminum paint of Stella’s work kept viewers out of the canvas, emphasizing the physical exhibition space. Those canvases maintained their connection to fine art, firmly announcing themselves as paintings in the environment of the gallery. Judd’s intentions, exemplified by the work in the artillery sheds at Marfa, had a similar adherence to art. As art objects, each box was an individual construction, artfully designed and displayed as part of the installation. Warhol’s Silver Factory promoted a sense of physical collectivity as well, although exaggerated to a theatrical, socializing atmosphere. Bourdon’s description of the space advances a secondary reading of collectivity— as a psychological collectivity. Whereas Stella’s *Black* and *Aluminum Paintings* indicated a psychological consciousness about specific histories, Warhol’s metallic spaces created an immediate transformation, as visitors imagined themselves as members of Warhol’s celebrity entourage. The walls of the Factory produced a reflective surface and a physical

⁹¹ David Bourdon, Warhol (Harry N. Abrams: New York, 1989), 205.

repellency, as they both mirrored images and unified bodies in the central space. Viewers lost themselves in the individualizing depths of Abstract Expressionist canvases from the fifties, but were brought together in Warhol's industrial commune.

Despite Pollock's occasional use of aluminum paint, his interlocking drips did not yield a mirror-like field of color found on a Warhol silkscreen.⁹² Pollock used an unprimed canvas, causing the cloth to soak up the paint, rather than reflect it, such as on a primed canvas or unabsorbent metal surface. As Jones observes, "Warhol, by contrast, used metallic paint for entire backgrounds of silkscreen paintings in the early 1960s, eliminating even the trace of a brushstroke by using aerosol spraycans."⁹³ Pursuing this sense of detachment, Warhol's silver silkscreens embody the industrial aesthetic, as they were both produced in the Factory and utilized the spray-painted, silkscreen technique. The paint was not rolled over the screen, but sprayed, allowing a limited connection to the participating artist. Like Judd's use of outside fabrication, Warhol could claim that any silkscreen produced in the Factory was his, because it was the generation of the idea and color that mattered, not the physical manufacture from his hand. Such detached, anti-art techniques emphasize the artist's displacement of meaning and a "surface only" interpretation of the work via the removal of the artist's hand.

Adopting silver as his signature color even beyond the studio's walls, Warhol perpetuated themes of glamour and technology. *Triple Silver Disaster* (Fig. 20) is a supreme example of the silver silkscreen and monochrome blank. It is intriguing to

⁹² Jones, 211.

⁹³ Ibid.

examine a work that does not have obvious Hollywood connotations such as *Silver Marlon Brando* (Fig. 21), but that adopts a sense of glamour even without the obvious subject matter. Warhol attempts to erase the sense of loss and horror of the electric chair by using something so obviously campy, industrial, and glamorous as silver. The blurred photograph in its three repetitions has an indirectness that reduces an emotional reaction in the viewer that might have occurred in a crisp reproduction of a single chair. Silver even refers to the electric chair as a machine, adopting the color of technology. The electric chair is a machine that kills from a distance, much like Warhol's screened painting technique. Furthermore, the cool hue of silver contrasts with other disaster silkscreens in which the color takes on evocative associations such as in *Blue Electric Chair* (Fig. 22) or *Mustard Race Riot* (Fig. 23). Similar to Stella's symbolic use of black, the blue electric chair silkscreen adopts a dark, somber mood, suggesting death. Likewise the mustard yellow *Race Riot*, a depiction of police attacks on civil rights demonstrators, evokes meaning through color as the poisonous chemical of mustard gas. Silver, on the other hand, is a color found in metallic materials, perhaps not sharing the emotional associations of other hues. This shocking use of silver creates a conflict with the image, inviting the comparison with works like *Silver Marlon Brando* that associate with Hollywood. In *Triple Silver Disaster*, the spaces of fantasy and Hollywood, machine and technology, and death and disaster come together in a genre of incongruity. Finally, the silver monochrome is not nearly a space for imaginative thought as is the blue field that exists as the referent for the immediate death. Stella's aluminum suggests themes of speed and car racing, the surface correlating to a precise, deeper meaning. Warhol's "spacey" and futuristic

glamour, however, contrasts with the death and disaster subject matter, acting instead to deflect an emotional correlation. The silver blank, not entirely flat, instills an ambiguous illusion inherent in Warhol's own personality and intention. Nevertheless, the industrial silver color of *Triple Silver Disaster* had the ability to repel viewers, preventing their emotional association to meaning behind the surface.

In 1965 Warhol proclaimed he was running out of ideas, and wished to retreat into filmmaking. First, however, Warhol's 1966 installation of *Cow Wallpaper* (Fig. 24) and *Silver Clouds* (Fig. 17) at the Leo Castelli Gallery marked the end to the highest period of productivity in Warhol's career. According to art historian Eric Shanes in *Warhol: The Life and Masterworks*, "the artist was disillusioned with the creation of fixed images,"⁹⁴ and was looking for alternatives to the silkscreen and progressively moving away from any notion of picture-making art. Far from the subject matter of Warhol's earlier pop icons, the *Silver Clouds* were an anti-art gesture due to their industrial production. Warhol originally wanted to create floating light bulbs, as he owned a drawing of a horizontally floating light bulb by Jasper Johns, but this was not feasible. Warhol's technical assistant, Harold Hodges, instead came across a metallized, plastic film called Scotchpak, a wrapping material produced by 3M, the Minnesota Mining & Manufacturing Company. Scotchpak consisted of sheets of polyester film and polyethylene film laminated together with a thin middle layer of aluminum. The floating pillows were made by Billy Klüver, an electronics engineer known as the "artist's scientist" for his work on the project. Each

⁹⁴ Eric Shanes, *Warhol: The Life and Masterworks*, 3rd ed. (France: Confidential Concepts, 2004), 68.

pillow was approximately three by four feet, inflated with helium, and pulled downward with tiny sand weights so the pillows did not bunch at the ceiling. Significantly, the material is another cheap industrial medium, furthering the connection to the Factory and the machine.

Taking on a life of their own, the clouds traveled by as the movement of viewers interrupted the air currents of the gallery. Bourdon describes how static electricity and temperature also shifted the movement of the kinetic sculptures: “As soon as all the clouds got moving, it took a long time for them to settle down. It was a novel experience to be confronted by floating forms that were soft and resilient and seemed to be both utterly passive and totally free.”⁹⁵ Suddenly the monochrome of *Triple Silver Disaster* has become a rectangular, three-dimensional form, referencing clouds and the geometry of Minimalist sculpture, such as the machine-made, inert boxes by Judd. Although both Judd’s work and Warhol’s *Clouds* are Minimalist, Warhol’s flying sculptures are the opposite of the gravity bound cube. Juxtaposed with the decorative *Cow Wallpaper*, a critique of the tradition of wall-hung painting, the *Silver Clouds* were conceived for collective space, as were the installations of *Aluminum Paintings* and Judd’s *Marfa*. In their movement and interaction with the human body, however, they created a novel, multi-sensory experience of not just kinetic, but participatory sculpture. Viewers could actually touch the pillows and bounce them off of their bodies in a playful union in the gallery. In fact Merce Cunningham demonstrated the industrial sculpture’s relation to space and the body by using the participatory sculpture in his 1968 ballet entitled *Rain Forest*.

⁹⁵ Bourdon, 228-231.

The installation was the ultimate manifestation of Warhol's statement in an interview with Gretchen Berg from 1966: "I didn't want to paint anymore so I thought that the way to finish off painting for me would be to have a painting that floats, so I invented the floating silver rectangles that you fill up with helium and let out of your window...I like silver."⁹⁶ Warhol even let one *Cloud* float out the window during the exhibition opening, claiming those with too many possessions could let go of materiality by doing the same.⁹⁷ This action, however, as Warhol literally released the artwork from his hand, seems more like a symbolic bid adieu to his former silkscreen painting methods as he would shift to industrial fabrication and filmmaking.

Warhol's surfaces were never meant to be non-illusionistic like Judd's metal boxes. Neither did Warhol deny allusion. Warhol's surfaces successfully yield meanings of the industrial Factory and also of glamour and the Hollywood silver screen due to the artist's near-theatrical productions in both the studio and the gallery. In an interview with artist Jeff Koons by Warhol's assistant Gerard Malanga, Koons stated, "...I've just loved Andy's work because it's defined to me what type of emotional experiences I can have in life and also a sense of what type of union is possible in life with other people."⁹⁸ Although Koons distinctly referred to a psychological union based on the American consumer images, Warhol's use of silver

⁹⁶ Warhol, "Andy Warhol: My True Story," Wall Text, The Warhol Museum.

⁹⁷ Shanes, 68.

⁹⁸ Jeff Koons, "A Conversation with Jeff Koons," interview by Gerard Malanga, in Andy Warhol: 5 Deaths, ed. Gerard Malanga (New York: Stellan Holm Gallery, 2002), 16.

color, aluminum, and industrial materials encouraged a physical union through the awareness of space, the integration of movement, and the inclusion of celebrity culture.

CHAPTER 5

CONCLUSION

Before Minimalists and Pop artists claimed to prevent viewers from penetrating their work, the vast canvases and painterly layers of the Abstract Expressionists caused viewers to experience art on an individual, emotional level. Artists in the fifties welcomed the act of assigning grand meaning to the abstract composition, and expressed their notions of the Sublime through writings and interviews. Yet viewing experiences remained personal and separate. The Abstract Expressionist galleries of the The Museum of Modern Art are always quiet, even on a crowded weekend afternoon. Where Barnett Newman's *Vir Heroicus Sublimus* hangs, visitors can be found gazing up at the red canvas for several minutes, walking within inches of the surface, and then stepping back to evaluate the effects of its engulfing environment. Visitors even linger in this room longer than in others, listening to the full length of the Newman audio guide as they crave the knowledge that the guide offers. Visitors generally do not converse in this room, unless they are part of a gallery talk or guided tour. Whether this is because the MoMA is a renowned museum, worthy of the visitor's deferential behavior, or whether the awe-inspiring fame of the Barnett Newman has reached the general public cannot be measured. Yet other highlights from the rest of the Museum's Painting and Sculpture collection do activate discussion among groups of visitors. In short, there is something magical

about the Newman. Its scale is unparalleled in the galleries, and its powerful red expanse has the effect of quieting a person through an experience of the Sublime. The painting achieves an individualizing effect in which the gallery becomes a space for subjective reflection.⁹⁹

It should be stated that personal reflections in the gallery did not cease to exist upon the arrival of Minimalism and Pop in the sixties. It is certain that a lone visitor might engage in contemplative meditation when entering a New York gallery on a quiet morning, no matter what the subject or material of the work may be. The Abstract Expressionist color field painting would not usually acknowledge the physical presence of the viewer— except perhaps through general formal structures such as Newman's vertical zips. The works of the sixties, however, acknowledged both the presence of the artwork *and* the presence of public interaction due to the repellent qualities of metallic surfaces and the installation practices of those works.

Stella, Judd, and Warhol claimed meaning was displaced from depth to surface, where supposedly no further displacement could occur. A further displacement does occur, however, despite the declarations of the artists. The surfaces of the works displaced meaning to spaces of public interaction, such as a shared psychology through suggestive titles, a collaborative studio, or a physical installation that encouraged social contact. The metallic surfaces also transferred meaning to the cultural associations of technology, industrialism, and the metal itself.

The first space of public interaction produces awareness about artistic themes and references, a generally shared mentality in the gallery. Stella's *Black Paintings*,

⁹⁹ This account reflects the observations made by the author for a Visitor Studies project during a Summer 2006 internship at the Museum of Modern Art.

although they did not utilize the metallic surface of the *Aluminum Paintings*, incorporated a geometric aesthetic, that with the addition of intriguing titles, created a shared knowledge of history. Titles such as *Arbeit Macht Frei* and *Die Fahne Hoch!* encouraged viewers to suspect a link to Hitler's ideological war during World War II. Stella also displaced meaning to his own psycho-sociology because of the evocative titles of his *Aluminum* series that referred to car racing, and ultimately to personal stories of death and friendship. Additionally, imagery also caused a shared consciousness about issues in society such as Warhol's American consumer culture reference to Brillo cleaning products.

Whereas Pollock and other Abstract Expressionists worked in emotional solitude, the Minimalists and Pop artists frequently shared space. The decade of the sixties ushered in a trend of the collaborative workspace. The metallic works created new meanings by referring back to their places of fabrication. One such place was the communal New York studio of Frank Stella and Minimalist Carl Andre. Although not the factory-like setting of Warhol's studio, or the collaborative manufacturing efforts of the Bernstein Brothers and Judd, Stella and Andre created a joint space. Andre worked in metals as well, notably with replaceable square units that he positioned directly onto the floor in a system that he called "axial symmetry." Andre's work, exemplified by a 1969 work entitled *Magnesium-Zinc Plain* (Fig. 25), recalled the artist's previous jobs as a freight brakeman and conductor on the railway and his subsequent interest in alternative industrial mediums. Comprising aluminum, lead, zinc, and magnesium plates, as well as building bricks, each distinct grid signified itself as a specific material along the lines of Judd's theories. Moreover, the unique

installation across the floor was not simply intended to be seen, but also intended to be walked on. Andre believed that part of understanding the identity of his materials was in the viewer's differentiation between the material work and the floor. In this way, the work of Carl Andre indicates that public interaction could actually be a physical encounter with the work itself.

A further displacement of meaning related to the physical context of the exhibition room itself. This space of collectivity, rather than a shared consciousness or the joint studio, became one of public interaction that was undoubtedly the result of metallic repellency. Impervious metallic surfaces established a physical presence not within layers of paint but in intermediary spaces. The meaning of the metallic and industrial work is therefore not only on the surface but resides in the exhibition room as well. The *Aluminum Paintings*' subtle projection from the wall did not engage a physical touch comparable to Andre's floor grids, yet announced a new objective presence. Stella's object paintings were innovative in that they predated the height of Minimalism through their physicality in combination with aluminum paint. The aluminum surfaces in the context of the series also supplied more meaning than would a single painting. As paintings, Stella maintained their connection to fine art. When the whole space became involved, however, Stella created an environment in the Leo Castelli exhibition in which the large canvases enveloped viewers by creating surface repellency.

By emphasizing the word "specific," Judd claimed that the meaning of the work was attached to the metallic qualities only. Judd's works transfer meaning from their identity as "specific objects" to objects within the real world, displacing

meaning depending on the physical context. The installations at Marfa become about permanency, industrialism, and the interaction within a physical environment.

Artist Robert Smithson's interpretation of the word "displacement" in his "mirror displacements" work helps to understand how environment affects meaning. Smithson, who is known for his Land Art and Earthwork, created installations with mirrors in physical environments. He photographed these environments, and also created indoor "non-sites," utilizing earth, rock, and salt crystals with mirrors in smaller installations. The outdoor art sites, such as *Mirror Displacement (Grassy Slope)* (Fig. 26) became part of the physical environment, but the environment became part of the art as well, as the mirrors reflected the surrounding space and signified a meaningful displacement of place. Smithson's acknowledgement of the environment's effect on the artwork indicates that works can alter meaning depending on a crucial physical context, such as in Judd's installations. Inherent to the three-dimensionality of Judd's stacked boxes or floor works, the physical presence in the gallery manifests a new architectural space. The industrial works created surface illusionism that reflected the light and suggested multi-dimensional readings of Minimalist sculpture, not confined to the specificity of the material. This interpretation emphasizes the architecture of interaction and the supremacy of the physical context.

Moreover, the materials themselves displaced meaning to the cultural associations of the technological age and uses of metal in the real world. Metallic materials in the sixties did not merely recall the qualities of the metal as Judd suggested. The metallic works not only reflected the psychological unions, physical

collectivity, and the collaborative studio space but also referred to the growth of technology and partook of a cultural trend. With industrialism, consumer culture, and an economic postwar boom in its heyday during the sixties, shared experiences within the space of industrial mediums take on greater significances. In the interview between Jeff Koons and Gerard Malanga, Koons not only discussed the sense of emotional union that Warhol provided, but he referred to the democratizing power of Warhol's subject matter. He stated, "That's the one thing I think Andy's work, of course, did was really help to unify people and give people a sense of confidence in their own cultural history. He showed the things that we share in our cultural history and this helps unify everyone."¹⁰⁰ Koons suggested that Warhol's Pop art subject matter, "the things" of American society such as Campbell Soup or the iconic photo of Marilyn Monroe created cultural recognition. In fact, Warhol's initial desire to call his art "commonism" reflects the unification of society through commercial culture, as Jones argues in her chapter "Andy Warhol's Factory, 'Commonism,' and the Business Art Business."¹⁰¹ Perhaps overlooked, it should be seen that expanded industry and consumption of metal are also part of the sixties cultural history.

Emerging from World War II as a military and economic superpower, the United States proved its potential to the world through technological advances and the new modern capitalism of the sixties in which the emergent business culture and dynamic advertising came to the forefront. The decade's explosive technology and capitalism, through the eyes of the artist, finds its representation in the material

¹⁰⁰ Koons, in Malanga, 16.

¹⁰¹ Jones, 189-267.

identity of industrial mediums. Judd himself admitted in a 1968 article for the *Baltimore Sun*, “Artist Seeks Validity in Boxes,” “The more money I have the more technical means I can take advantage of...All these various means are there, and I may as well use them.”¹⁰² Of course Judd and the other Minimalist sculpture artists of the sixties did not arbitrarily decide to utilize some materials over others. They purposefully and actively sought out industrial fabrication. Judd’s seemingly nonchalant attitude reflects the same disinclination to meaning in his other writings and statements, but significantly reveals a desire to reflect his own cultural age.

Furthermore, metallic works continued to reflect consumption and industry beyond the 1960s. Minimalist works have been used by the fashion industry for a design that is clean, crisp, and mirrors simple and elegant clothing. Judd’s industrial work provided the design parallel for such boutiques as Calvin Klein in New York during the 1990s (Fig. 27). Although the use of such designs was not artfully integrated into the fashion scene until decades after the sixties, it is significant to note that works of industrial art even impact the lives of consumers. The representation of the public sphere is most appropriate for a retail business, where transaction and interaction occur constantly.

Finally, Warhol’s works displaced meaning due to the associations of silver. Warhol seized upon the silver surfaces to reflect an interest in the sociable and fashionable glitterati, give his entourage an aura of glamour, and reveal the industrial commercial culture of the sixties, despite the act he put on to conceal true intentions.

¹⁰² Barbara Gold, “Artist Seeks Validity in Boxes,” *Baltimore Sun*, March 3, 1968.

Additionally, Warhol not only referred to the prestige of his following and the hip sixties culture through metallic surfaces, but actually constructed and formed those spaces through his art. The Factory is an odd mixture of American industry and the representation of the sixties collaborative sensibility. Warhol's Factory and the connotations of the color silver transfer meaning from the silkscreened or spray-painted surface to the industrial history in Pittsburgh and America as a whole.

Stella, Judd, and Warhol are rarely mentioned in a single statement, yet James Meyer writes, "In the end, it was easier to speak of style rather than the amorphous concept of 'sensibility' – easier to compare Judd and Morris's cubes rather than the lack of affect apparent in the work of Stella, Warhol, and Judd."¹⁰³ Because distinctions between the styles of Minimalism and Pop were obvious, critics rarely compared a common "lack of affect," or absence of feeling attached to the artwork. This "lack of affect" was the polemical reaction against Abstract Expressionism; the sixties artists intended to refute certain feelings in their work. As the artists produced work, however, they failed to produce strictly affectless surfaces, and displaced meanings arose from different levels within the work, the installation, and the fabrication method. Once meaning can be located in different sites or levels of experience, it can continue the process of being displaced again and again, ultimately reflecting notions of collectivity tied to the culture of the sixties. Instead of making clear distinctions between Minimalism and Pop art, it is more useful to blur the boundaries between styles and connect the movements as culturally bound to one another, just as they were united in their rejection of Abstract Expressionism.

¹⁰³ Meyer, 47.

FIGURES



1. Barnett Newman, *Vir Heroicus Sublimus*, 1950-1951, Oil on canvas, The Museum of Modern Art, New York, www.moma.org.



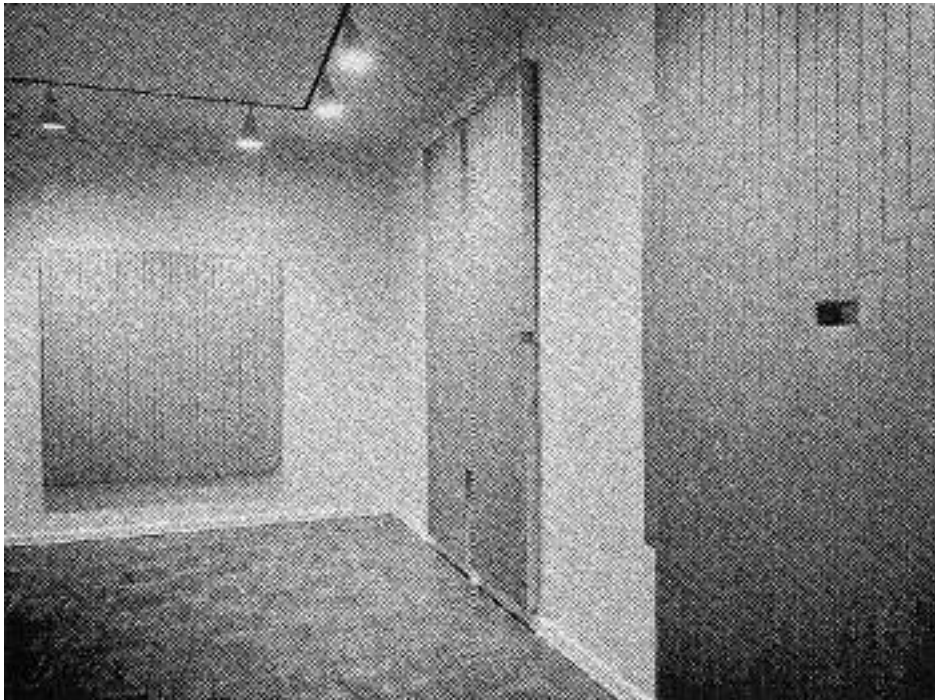
2. Robert Rauschenberg, *Erased De Kooning Drawing*, 1953, drawing, traces of ink and crayon on paper, mat, label, and gilded frame, San Francisco Museum of Modern Art, www.sfmoma.org.



3. Jackson Pollock, *Lavender Mist*, 1950, Oil, enamel, and aluminum paint, National Gallery of Art, www.nga.gov.



4. Frank Stella, *Die Fahne Hoch!*, 1959, Black enamel on canvas, Whitney Museum of American Art, Fisher Fine Arts Image Collection.



5. Frank Stella, Installation photograph of *Aluminum Paintings*, 1960, aluminum paint on canvas, Leo Castelli Gallery, Fisher Fine Arts Image Collection.



6. Frank Stella, *Six Mile Bottom*, 1960, aluminum paint on canvas, Tate Gallery, London, www.tate.org/uk.



7. Frank Stella, *Jill*, 1959, metallic burglar-alarm tape, Collection of Lawrence Rubin, in Jones, Machine in the Studio, 157.



8. Frank Stella, *Marquis de Portago* (second version), 1960, aluminum oil paint on canvas, New York Collection, in Rubin, Frank Stella Paintings: 1958-1965, 108.



9. Donald Judd, Installation photograph of "New Work: Part 1", 1963, various mediums, Green Gallery, New York, in Meyer, Minimalism: Art and Polemics in the Sixties, 46.



10. Donald Judd, *Untitled*, 1965, galvanized iron, seven parts, Moderna Museet, Stockholm, in Kellein, Donald Judd: 1955-1965, 128.



11. Donald Judd, Installation photograph of “La Mansana de Chinati”, 1964-68, The Chinati Foundation, Marfa, Texas, in Kellein, Donald Judd: 1955-1965, 136-37.



12. Donald Judd, *Untitled*, 1969, clear anodized aluminum and purple Plexiglas, Collection of Thomas and Cristina Bechtler, Switzerland, in Elger, Donald Judd: Colorist, 41.



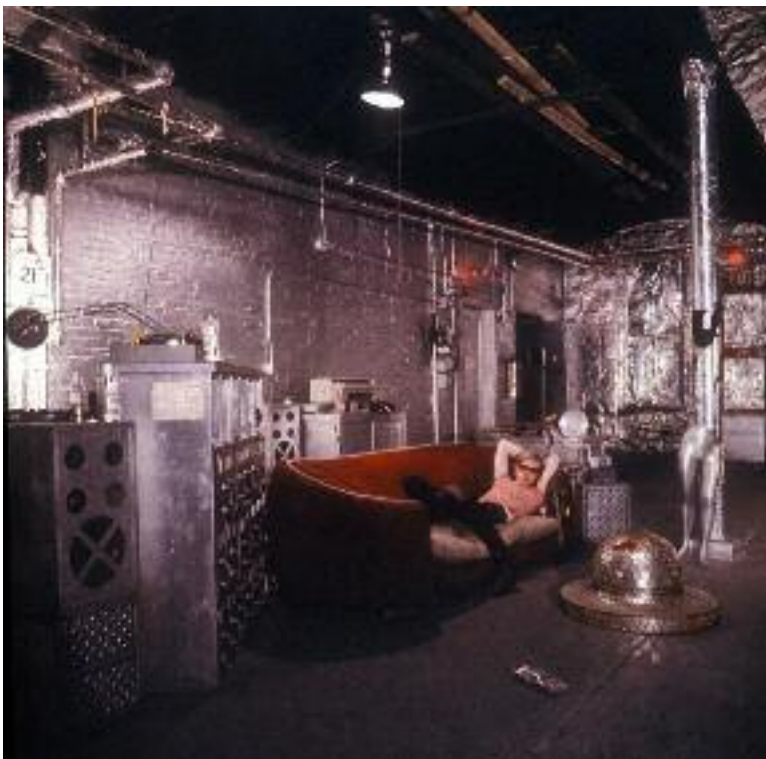
13. David Smith, *Cubi XXVII*, 1965, stainless steel, Solomon R. Guggenheim Museum, New York, www.guggenheimcollection.com.



14. Donald Judd, Permanent installation of fifty-two works, photograph from 2004, anodized aluminum, North artillery shed, The Chinati Foundation, Marfa, Texas, in Serota, Donald Judd, 130.



15. Donald Judd, Permanent installation of forty-eight works, photograph from 2004, brass, South artillery shed, The Chinati Foundation, Marfa, Texas, Serota, Donald Judd, 131.



16. *Andy Warhol in the Silver Factory*, photograph by Jon Naar, 1965, Reynolds aluminum foil and DuPont Krylon industrial paint, New York, Fisher Fine Arts Image Collection.



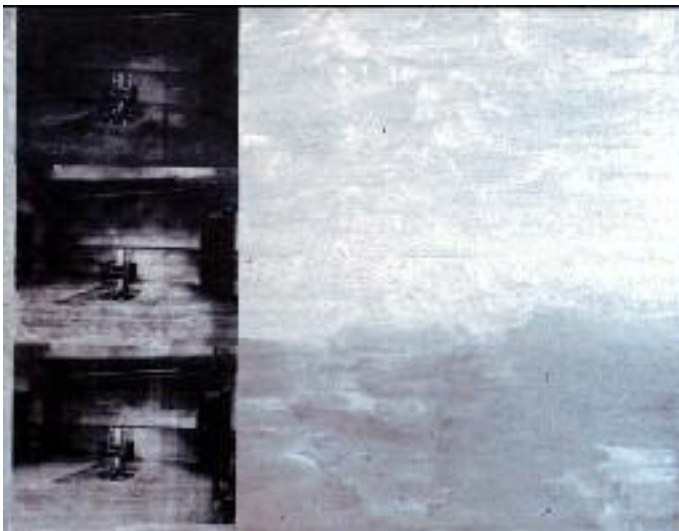
17. Andy Warhol, *Silver Clouds*, 1966, Helium-filled Scotchpak, The Warhol, Pittsburgh, Photograph by the author.



18. Photograph at the opening of “Andy Warhol” of Andy and Edie Sedgwick, 1965, Institute of Contemporary Art, Philadelphia, Fisher Fine Arts Image collection.



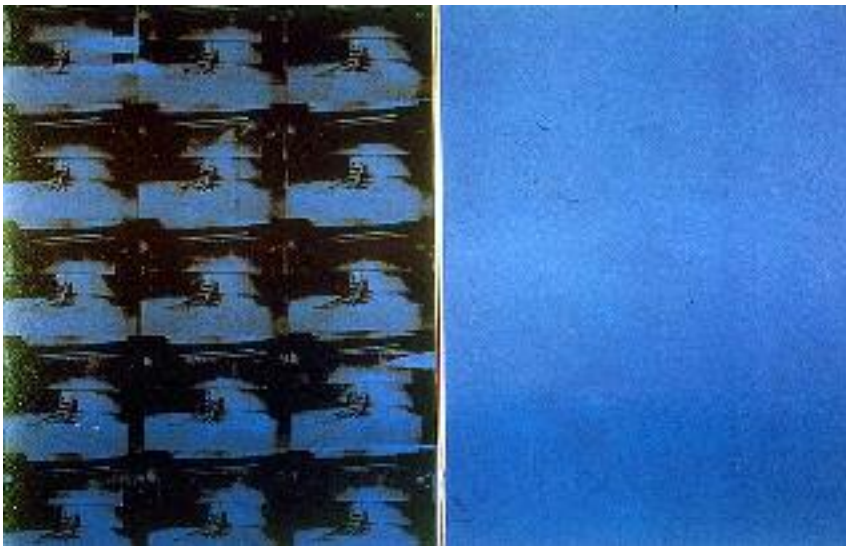
19. Andy Warhol, *Brillo*, 1964, synthetic polymer paint and silkscreen on wood, Tate Gallery, London, Fisher Fine Arts Collection.



20. Andy Warhol, *Triple Silver Disaster*, 1963, silver paint and silkscreen paint on linen, Wadsworth Athenaeum, Hartford, Fisher Fine Arts Collection.



21. Andy Warhol, *Silver Marlon Brando*, 1963, acrylic silkscreen on canvas, Private Collection, Fisher Fine Arts Image Collection.



22. Andy Warhol, *Blue Electric Chair*, 1963, acrylic and silkscreen on linen, Saatchi Collection, London, Fisher Fine Arts Image Collection.



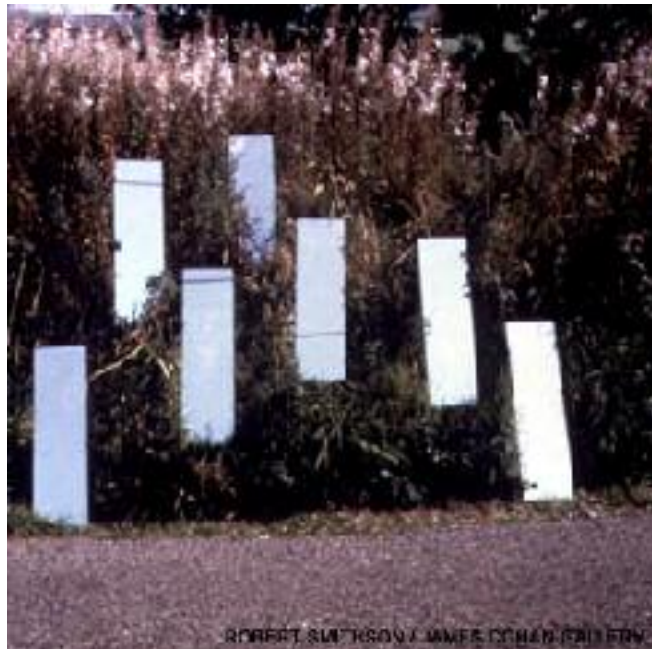
23. Andy Warhol, *Mustard Race Riot*, 1963, acrylic and silkscreen on canvas, Private Collection, Fisher Fine Arts Image Collection.



24. Andy Warhol, *Cow Wallpaper*, 1966, silkscreen on paper, Installed at the Leo Castelli Gallery, New York, Fisher Fine Arts Image Collection.



25. Carl Andre, *Magnesium-Zinc Plain*, 1969, magnesium and zinc, Museum of Contemporary Art, San Diego, www.mcasd.org.



26. Robert Smithson, *Mirror Displacement (Grassy Slope)*, September 1969, earthwork and mirrors, England, www.robertsmithson.com.



27. Donald Judd, Furniture, 1995, various mediums, Calvin Klein shop designed by John Pawson, New York, in Meyer, Minimalism: Art and Polemics in the Sixties, 220.

SELECTED BIBLIOGRAPHY

- Agee, William C., "Donald Judd and the Endless Possibilities of Color." In Donald Judd: Colorist, ed. Dietmar Elger, 33-51. Hannover: Hatje Cantz Publishers, 2000.
- Anfam, David. "Interrupted Stories: Reflections on Abstract Expressionism and Narrative." In American Abstract Expressionism, ed. David Thistlewood, 27-29. Liverpool: Liverpool University Press, 1993.
- Auping, Michael, ed. Abstract Expressionism: The Critical Developments. New York: Harry N. Abrams, Inc., 1987.
- Baker, Kenneth. Minimalism: Art of Circumstance. New York: Abbeville Press, 1988.
- Batchelor, Donald. "Everything as Colour." In Donald Judd, ed. Nicholas Serota, 65-75. New York: Distributed Art Publishers, 2004.
- Battcock, Gregory, ed. Minimal Art: A Critical Anthology. With an Introduction by Anne M. Wagner. New York: E.P. Dutton & Co., Inc., 1968.
- Bockris, Victor. Warhol: The Biography. New York: Da Capo Press, 1997.
- Bourdon, David. Warhol. Harry N. Abrams: New York, 1989.
- Buchloh, Benjamin. "Andy Warhol's One-Dimensional Art: 1956-1966." In Andy Warhol: a Retrospective, ed. Kynaston McShine, 39-57. New York: Museum of Modern Art, 1990.
- Chave, Anna C. "Minimalism and the Rhetoric of Power." Arts Magazine. 64 no. 5 (January 1990): 44-63.
- Clearwater, Bonnie. Frank Stella at two thousand: Changing the Rules. With Selected Writing by Frank Stella. North Miami: Museum of Contemporary Art, 2000.
- Cooper, Harry and Megan R. Luke. Frank Stella: 1958. New Haven: Yale University Press, 2006.
- Elger, Dietmar, ed. Donald Judd: Colorist. Hannover: Hatje Cantz Publishers, 2000.

- Fried, Michael. Art and Objecthood: Essays and Reviews. Chicago: University of Chicago Press, 1998.
- _____. Three American Painters: Kenneth Noland, Jules Olitski, Frank Stella. Cambridge: Meriden Gravure, 1965.
- Gold, Barbara. "Artist Seeks Validity in Boxes." Baltimore Sun, 3 March 1968.
- Goldsmith, Kenneth. I'll Be Your Mirror: the Selected Andy Warhol Interviews: 1962-1987. New York: Carroll & Graf, 2004.
- Gough, Maria. "Frank Stella is a Constructivist." October 119 (Winter 2007): 94-120.
- Greenberg, Clement. "After Abstract Expressionism." Art International (Lugano) 6, no. 8 (October 1962): 24-32.
- _____. "Modernist Painting." Revised. Art & Literature (Lugano) no. 4 (Spring 1965): 193-201.
- _____. "Recentness of Sculpture." In American Sculpture of the 1960s, ed. Maurice Tuchman, 24-26. Los Angeles: Los Angeles County Museum of Art, 1967. In Minimal Art: A Critical Anthology, ed. Gregory Battcock with an Introduction by Anne M. Wagner, 180-186. New York: E.P. Dutton & Co., Inc., 1968.
- Guberman, Sidney. Frank Stella: An Illustrated Biography. New York: Rizzoli, 1995.
- Haskell, Barbara. BLAM! The Explosion of Pop, Minimalism, and Performance 1958-1964. New York: Whitney Museum of American Art in association with W.W. Norton & Company, 1984.
- _____. Donald Judd. New York: Whitney Museum of American Art, 1988.
- Hayden, Sally, ed. Decade of Transformation: American Art of the 1960s. Lawrence: Spencer Museum of Art, University of Kansas, 1999.
- Held, Jutta. "Minimal Art: eine amerikanische Ideologie." (1972) In Minimal Art: Eine kritische Retrospective, ed. Gregor Stemmrich, 458-459. Dresden: Verlag der Kunst, 1995. In Minimalism: Art and Polemics in the Sixties. Translated by James S. Meyer, 264. New Haven: Yale University Press, 2001.
- Hess, Thomas B. "Pop and Public." Art News (November 1963) In Pop Art: A Critical History, ed. Steven H. Madoff, 100-102. Berkeley: University of California

Press, 1997.

Jones, Caroline. Machine in the Studio: Constructing the Postwar American Artist. Chicago: University of Chicago Press Chicago, 1996.

Judd, Donald. "Art and Architecture." From a Lecture at the Department of Art and Architecture of Yale University, 20 September 1983. In Complete Writings: 1975-1986, Donald Judd. Eindhoven: Van Abbemuseum, 1987.

_____. "Art and Architecture" (1986). In Complete Writings: 1975-1986, Donald Judd. Eindhoven, Netherlands: Van Abbemuseum, 1987.

_____. Complete Writings: 1975-1986. Eindhoven, Netherlands: Van Abbemuseum, 1987.

_____. "Don Judd." Interview by John Coplans. In Don Judd, ed. John Coplans. Pasadena: Pasadena Art Museum, 1971. In Donald Judd: Sculpture, Prints, Furniture, ed. Margarida Veiga, 28. Lisbon: Centro Cultural de Belém, 1997.

_____. "In the Galleries: Andy Warhol." Arts (January 1963): 49. In Pop Art: A Critical History, ed. Steven H. Madoff, 268. Berkeley, University of California Press, 1997.

_____. "Jackson Pollock" (1967). In Complete Writings: 1959-1975, Donald Judd. New York: New York University Press, 1975.

_____. "Some aspects of color in general and red and black in particular" (1993). In Donald Judd: Colorist, ed. Dietmar Elger, 79-116. Hannover: Hatje Cantz Publishers, 2000.

_____. "Specific Objects." Art Yearbook 8 (1965): 74-82. In Complete Writings: 1975-1986, Donald Judd. Eindhoven, Netherlands: Van Abbemuseum, 1987.

_____. Statement. Dictionary of Contemporary Artists (1977). In Complete Writings: 1975-1986, Donald Judd. Eindhoven, Netherlands: Van Abbemuseum, 1987.

Judd, Donald and Frank Stella. "Questions to Stella and Judd." Interview by Bruce Glaser and edited by Lucy R. Lippard. ArtNews 65 (September 1966): 55-61.

Kellein, Thomas. Donald Judd: Early Work 1955-1968. New York: Distributed Art Publishers, Inc. 2002.

Klein, Philip. A Social Study of Pittsburgh New York: Columbia University Press, 1938. In. Warhol, ed. Victor Bockris, 20. New York: Da Capo Press, 1997.

- Koons, Jeff. "A Conversation with Jeff Koons." Interview by Gerard Malanga. In Andy Warhol: 5 Deaths, ed. Gerard Malanga, 15-26. New York: Stellan Holm Gallery, 2002.
- Krauss, Rosalind. "Allusion and Illusion in Donald Judd." Artforum 4, no. 9 (May 1966): 24-26.
- _____. Passages in Modern Sculpture New York New York: The Viking Press, 1977.
- "Krylon History." Krylon Products Group. 2007. Krylon. 10 March 2007
<http://krylon.com/main/level_template.cfm?levelid=1&sub_levelid=1&content=sublevel>.
- Madoff, Steven H., ed. Pop Art: A Critical History. Berkeley: University of California Press, 1997.
- McElheny, Josiah. "Invisible Hand." Artforum 42, no.10 (June 2004): 209.
- Meyer, James S. Minimalism: Art and Polemics in the Sixties. New Haven: Yale University Press, 2001.
- Morris, Robert. "Notes on Sculpture." Artforum 4, no. 6 (February 1966): 42-44.
- Name, Billy. Interview by Steven Watson [April 29 and July 29, 1998 (audio); July 29, 1999; November 19, 2000; and July 11, 2002 (video)]. Factory Made: Warhol and the Sixties, ed. Steven Watson. New York: Pantheon, 2003.
- Newman, Barnett. "The Sublime is No." Tiger's Eye 1, no.6 (December 1948): 51-53.
- O'Doherty, Brian. "Exhibitions at Galleries." New York Times, 14 December 1963.
- Olson, Stefanie. "New Materials and Methods in American Art of the 1960s." In Decade of Transformation: American Art of the 1960s, ed. Sally Hayden, 27-37. Lawrence: Spencer Museum of Art, University of Kansas, 1999.
- Ondine. Interview by Patrick S. Smith (Fall 1978). Warhol: Conversations about the Artist, ed. Patrick S. Smith, 251-281. Ann Arbor: UMI Research Press, 1988.
- Ortega y Gasset, José. Quoted by Donald Judd. "The Chinati Foundation." Chap. in The Chinati Foundation, ed. Donald Judd. Marfa, Texas: The Chinati Foundation, 1987.
- Rauschenberg, Robert. "Video: Rauschenberg on Erased De Kooning." Produced by San Francisco Museum of Modern Art. Video. "SFMOMA: Robert Rauschenberg:

Erased De Kooning Drawing.” Artists/Artists in Context: Making Sense of Modern Art. San Francisco Museum of Modern Art. 20 January 2007.
<<http://www.sfmoma.org/msoma/artworks/93.html>>.

Richardson, Brenda. Frank Stella: The Black Paintings Baltimore: The Baltimore Museum of Art, 1976.

Rosenblum, Robert. Frank Stella Harmondsworth, England: Penguin Books, 1971.

_____. “The Abstract Sublime.” ArtNews, February 1961. In On Modern American Art, ed. Robert Rosenblum. New York: Harry N. Abrams, 1999.

Rubin, Lawrence. Frank Stella Paintings: 1958 to 1965. New York: Stewart Tabori & Chang, Publishers, 1986.

Rubin, William S. Frank Stella. New York: The Museum of Modern Art, 1970.

_____. Frank Stella: 1970-1987. New York: The Museum of Modern Art, 1987.

_____. “Younger American Painters.” Art International 4, no. 1 (January 1960): 24-31.

Schoenholz Bee, Harriet and Cassandra Heliczer, eds. With an Introduction by Glenn Lowry. “Barnett Newman: *Vir Heroicus Sublimus*.” MoMA Highlights: 350 Works from The Museum of Modern Art New York, 2nd ed. New York: The Museum of Modern Art, 2005.

Serota, Nicholas, ed. Donald Judd New York: Distributed Art Publishers, 2004.

Shanes, Eric. Warhol: The Life and Masterworks. 3rd ed. France: Confidential Concepts, 2004.

Shiff, Richard. “Donald Judd: Fast Thinking.” In Donald Judd Late Work, ed. PaceWildenstein, 4-23. New York: PaceWildenstein, 2000.

Smith, Patrick S. Andy Warhol’s Art and Films. Ann Arbor: UMI Research Press, 1986.

_____. Warhol: Conversations about the Artist Ann Arbor: UMI Research Press, 1988.

Smithson, Robert. “Donald Judd.” In 7 Sculptors. Philadelphia: Institute of Contemporary Art, 1965. In The Writings of Robert Smithson, ed. Jack Flam, 4-6. Berkeley: University of California Press, 1996.

Stella, Frank. Interview by William Rubin (June or September 1969). Frank Stella, ed.

William Rubin. New York: The Museum of Modern Art, 1970.

_____. Untitled Lecture and Sketches. Presented to art students at the Pratt Institute, New York. January-February 1960. In Frank Stella: The Black Paintings, ed. Brenda Richardson, 78-80. Baltimore: The Baltimore Museum of Art, 1976.

Thistlewood, David, ed. American Abstract Expressionism. Liverpool: Liverpool University Press, 1993.

Warhol, Andy. "Andy: My True Story." Interview by Gretchen Berg. Los Angeles Free Press, 17 March 1967, 3. In I'll Be Your Mirror: the Selected Andy Warhol Interviews: 1962-1987, Kenneth Goldsmith, 85. New York: Carroll & Graf, 2004.

_____. The Philosophy of Andy Warhol: (From A to B and Back Again). New York: Harvest Books, 1977.

_____. "What is Pop Art." Interview by Gene Swenson. Art News (November 1963 – February 1964): 111-137.

Warhol, Andy and Pat Hackett. POPism: The Warhol '60s. New York: Harper & Row, 1980.

Watson, Steven. Factory Made: Warhol and the Sixties. New York: Pantheon, 2003.

